

Vol. 2

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Part. 2

Saturday, May 18, 1929.

Worked on packing plant material for shipment to Washington and got off three packages by parcel post.

We sent two over, did not think to weigh them and one had to be returned so we opened it up and took out a box and made it into a third package. We also wrote Mr. Ryerson in detail concerning this shipment.

About 2:00 p. m. Mr. Beattie came into the laboratory and said that while over near the consulate he met the Consul General near the Consulate and he told him there was a cablegram for P. H. Dorsett with charges of Yen 30.24, collect and that they sent it over to the Imperial Hotel not having sufficient funds to pay the charges. A cable coming in with as heavy charges as the above makes a rather complicated situation and we cannot understand why they should not come prepaid.

We acknowledged the receipt of the cable in our letter noted above, a copy of the letter, which is self-explanatory follows.

Horse and I had about completed plans for a weeks trip into the Izu Peninsula when it occurred that perhaps Mr. Horse would prefer to make a trip into Hokkaido, the principal soybean region of Japan, to look the field over and see what the conditions are for making temporary headquarters there for a time, and to find out the season best suited for getting the information and pictures desired concerning the planting, cultivation, harvesting, and handling of this crop in Japan.

In view of the fact that Mr. and Mrs. Beattie are leaving the first of the week for China, we thought that perhaps we could arrange to get his interpreter to help us in the Izu Peninsula during the time we may be in that region, and Mr. Morse can have Mr. Sugatake with him in Hokkaido.

The proposition looked o. k. so we took it up with Mr. Beattie, and practically completed the arrangements for proceeding along the line outlined. We both plan on getting away the early part of this week, and will perhaps be away for about a week or maybe a little longer.



Negative #43829.

A dwarf wisteria tree in full bloom in Hibiya Park, Tokyo, Japan.

Sunday, May 19, 1929.

The porsetts and the horses were packing and getting things in shape for storing our personal trunks and effects and releasing our rooms at the hotel for the time we are away today. We also worked on arranging our pictures and in changing herbarium driers and in getting our cameras and other necessary equipment in shape to take with us.

Conditions for traveling and getting about in Japan in so far as Railway facilities are concerned, are much more simple and effective than in China, but very much more complicated in connection with getting from village to village, for here we do not find coolies and donkeys or carts in abundance as we found in China. Therefore, we have to readjust our plans and work along different lines and on a different basis from what we did in China in 1924-26 or what we expected when we left Washington.

When we start for the Izu Peninsula on Tuesday we will have four cameras and collecting outfit besides our personal effects. These we hope to get into one hand grip so as to relieve the situation of having so much baggage to handle on the road.

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Monday, May 20, 1929.

Worked at the Office in the forenoon writing to Mr. Harold S. Ryerson regarding the spool of colored motion pictures film #10 sent to him today by mail.

The Horses plant to leave Tuesday night for Hokkaido. We, the Dorsetts, had planned to leave for the Izu Peninsula Tuesday morning, but changed our plans and will leave Wednesday morning so as to go along with Mr. and Mrs. Beattie. When they sail Thursday, Mr. Kurihara will be free to go with us during the time we are away.

This afternoon, Mr. Suyetake and Dorsett went to the famous Shinto shrine of Kameido-Tenjin which is dedicated to Sugawa Michizane. There are two curved (or camel back) bridges there, one much smaller than the other across portions of the small lake or pond, and on the outer edges and in places near the center, lavender and white wisteria on trellises. The flower clusters are reported and recorded in the Official Guide Book of Northeastern Japan Vol. III, p. 289, as being as long as 10 feet. Today none that we saw would measure more than a foot or 18 inches.

The place was interesting, but we were more or less disappointed, both in the wisteria and the general appearance of the place, we made a number of pictures however.

From here we went to secure a picture of a wisteria vine trained over the side walk here in Tokyo. A few days ago a very good picture of the vine appeared in one of the Japanese papers. The vine was past its best, but we secured a very good picture which shows an effective use of this beautiful flowered vine on a public street.

We also stopped and made a picture of the so called "Red Gate" of the Tokyo Imperial University, an old and historic gate.

It is interesting to note in this connection that one of the interesting features of the history of this institution is the endowment of \$123,000 by Burton Hipburn, an American for the study of the American Constitution.

Copies of the letters written today and prints of the pictures made follow.

Copied from Mr. Morse's diary.

Arrangements were made through the Japanese Tourist Bureau in the Imperial Hotel for railroad and sleeper tickets to Sapporo, Japan. It was learned that a foreigner obtaining transportation through this Bureau can obtain unlimited stopovers to his destination, whereas a native is limited in stopovers. An order was placed with this Bureau about noon and at 5:00 p. m. tickets for express, railroad fare and berths were obtained. Traveling is made an easy matter through this agency as English is spoken and all details of a trip taken care of.

Transportation cost to Sapporo, Hokkaido from Tokyo, Japan:

Ueno station, Tokyo to Sapporo (2nd cl.) railroad fare ¥21.62

" " " " /Aomori, Express	
" " " " ticket (2nd cl.)	2.00

Hokodate to Sapporo Expr. ticket (2nd cl.)	1.30
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Lower berth (2nd cl.) Ueno to Aomori	4.50
--------------------------------------	------

" " " " Hakodate	4.50
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Negative #43701 a.

Small oval bridge to the left, central walk and
 through the pines the larger oval or camel-back bridge.
 Kamaido is famous on account of this Shinto shrine,
 its arched bridges and white and purple wisteria.



Negative #43701 b.

View from the left side of one of the oval bridges looking toward the large camels back bridge. In the foreground to the right is a portion of the small bridge. Just beyond two large stone lanterns and further on to the left the large camel-back bridge. To the right of this bridge is a white wisteria now in bloom.



Negative #43701 c.

A view almost at right angle to a large oval or
camels-back bridge. An old but attractive affair.

Negative #43701 d.

Practically the same as #43701 C. yet slightly different.





Negative #43701 E.

View showing a small arched bridge and a portion
of one of the shrine buildings.

Negative #43701 F.

View from a little in front of and to the left of the small arched bridge shown in picture #43701 E, and looking across a portion of a small lake to a wisteria and one side of the big arched bridge.





Negative #43701 G.

Taken at Kamado-Tenjin Shrine, almost like #43701 F
yet slightly different.



Negative #43701 H.

View along one of Japan's principal streets above the Imperial University. A short time before a picture of this wisteria over the street appeared in one of the Japanese daily newspapers.



Negative #43701 I.

The famous West Gate at the entrance to the Imperial
University at Tokyo, Japan.

REPORTS PARTIAL I.
 The above was done at the residence of J. J. Smith
 at the residence of J. J. Smith, at the residence of J. J. Smith
 at the residence of J. J. Smith, at the residence of J. J. Smith
 at the residence of J. J. Smith, at the residence of J. J. Smith
 at the residence of J. J. Smith, at the residence of J. J. Smith



Government Railway's

Dining Car Service

THE MIKADO SHOKUDO

A LA CARTE

SOUP	.3 0	FRIED FISH	.3 5
HAM AND EGGS	.4 5	OMELETTE	.2 5
BEEFSTEAK	.6 0	CHICKEN CUTLET	.5 0
CURRIED RICE	.3 5	STEWED BEEF	.4 5
COLD CHICKEN	.5 5	COLD BEEF	.4 5
HAM AND SALAD	.5 0	PUDDING	.2 5
SANDWICHES	.4 0	CHEESE	.3 0
ICE-CREAM	.2 0	TEA OR COFFEE	.1 0
CAKE	.1 0	FRUITS	
BREAD AND BUTTER ..	.1 0		

TABLE D'HOTE

BREAKFAST	.9 0
LUNCHEON	1.2 0
DINNER	1.5 0

Hours of Service

BREAKFAST	from 6.00 to 9.00 A.M.
LUNCHEON	1st call 11.00 A.M.
	2nd " 11.40 "
	3rd " 12.20 P.M.
	4th " 1.00 "
DINNER	1st call 5.00 P.M.
	2nd " 5.50 "
	3rd " 6.50 "

Meals will not be served till all are seated.

A La Carte meals are served except during the table d'hote hours.

THE MIKADO SHOKUDO

WINE LIST

	Per Qt.	Per Bot.	Per Pt.	Per Bot.	Per Glass		per Glass
Beer	.47	.29				Gin	.40
Black Beer ...	.49	.31				Stout	1.00 —
White Wine ...	4.00	3.00				Japanese Sake	.48 .24
Red Wine ...	{2.50	1.50				Tansan and Hirano Water	
	{3.50	2.50				Lemonade	
Whisky		.55				Ginger Ale	.26
Brandy		.55				Champagne Cider	
Peppermint		.40				Lemora	
Port Wine		.40					
Vermouth		.35					

CIGARS & CIGARETTES

Grilled Chicken (10 m')	¥ 1.50
Double Sirloin Steak (10 m')	¥ 1.50

御定食の献立を御望みにならない御方様の爲に定食時間中下記の**グリル御料理**を特に御注文に限り調理致します。どうぞ御豫約に伺ひました節に御申しつけ下さいませ。

グリルドチキンに野菜三種添
(外・果物・パン・珈琲) **金一圓五十錢**
ダブルビーフステーキに野菜三種添
(外・果物・パン・珈琲) **金一圓五十錢**

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御好み御料理

金三十錢

[illegible]

御
定
食

朝食御一人前	金九	錢
晝食御一人前	金一圓二十	錢
夕食御一人前	金一圓五十	錢
當列車食堂の定食時間は		
朝食	午前六時より九時	
晝食	第一回 午前十一時	
	第二回 午前十一時四十分	
	第三回 午後十二時二十分	
	第四回 午後一時	
晩食	第一回 午後五時	
	第二回 午後五時五十分	
	第三回 午後六時五十分	
豫め伺はせますボーイに食卓番號札を御請求下されば御座席を用意致して定刻の御着席を御待ち致して居ります。一品のお好み料理は定食時間外に致します。		

酒類代價

ビール (ユニオンキリン)	大瓶	四十七錢	小	二十九錢
黒ビール		四十九錢		三十一錢
白葡萄酒	四	圓	三	圓
赤葡萄酒	二圓五十錢	一圓五十錢		
ウキスキ	三圓五十錢	二圓五十錢	一杯	五十五錢
ブランデー				五十五錢
ペパーミント				四十錢
ポットワイン				四十錢
ベルモット				三十五錢
シ				四十錢
スタウト			小瓶	圓
和酒	中瓶	四十八錢	小瓶	二十四錢
炭酸水又ハ平野水				
レモネード				
シンジャエール				
シヤンペンサイダー				
三ツ矢レモラ				

二十六錢



鳴戸岬
Mino-aki



川崎水
Kawagata



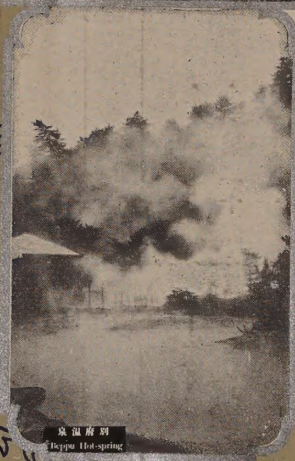
湯島
Unengatake



峠峠
Katsuki Plate



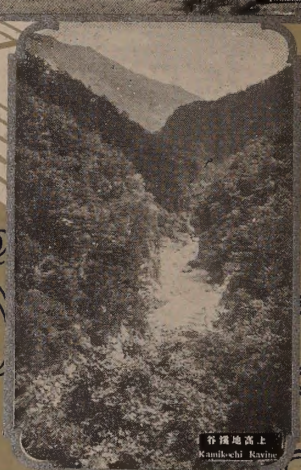
湖川和十
Tomadake



泉温府別
Heppu Hot-spring



滝高平
Kobayashi-Taki



谷深地高上
Kamibuchi Ravine

獻立及酒類代價表

みかど食堂

Tuesday, May 21, 1929.

Checked over photograph hs, wrote legends, and answered correspondence, also got things in shape so that the Horses could get off for Hokkaido tonight and the Dorsetts can leave tomorrow morning for Kyoto as planned and noted in yesterdays write-up.

Copies of letters answered and written today, which are self-explanatory follow.

Copied from Mr. Horses diary.

The Horse party with Mr. Guyetake left the Ueno station, Tokyo for Sapporo, Hokkaido Island, at 10:30 p. m. It was our first introduction to the Japanese sleeper which differs somewhat from our Pullmans in the States. The seats run lengthwise of the car and the berths are not as wide as American berths. The six-footer will not find the length suited to his height and will have to do more or less doubling up. There is much less privacy as all undress and dress in the aisles and the curtains are not close fitting. The toilets are used by both the men and women. In spite of handicaps we all rested very comfortably.

Wednesday, May 22, 1929.

Up early this morning and took a couple of grips of things, among them quite a number of pictures, which Mr. Suyetake brought down to the hotel when he came to meet and go with the Horses on the 10:30 train for Hokkaido last night.

These pictures will be numbered up and gotten in shape as soon as practicable after the Horses and porsetts return about June 1st, 1929.

Left Tokyo from the Tokyo Station at 9:30 a. m. The cost of the regular ticket from here to Kobe is 12 Yen 65 Sen, local trains here in Japan are not adapted for comfortable long distance travel, and for that reason Express Trains at the small rate of 4 Yen for the trip of something more than 300 miles is taken advantage of.

We arrived in Kyoto at 7:43 after a most fascinating and interesting day's trip through mountains and valleys laid out in fantastic paddy and grain plots.

The seats in the sleeper are lengthwise of the car, and for me, at least, are not nearly so comfortable as when arranged across the car. The diner was quite similar to those in the States. The service, at least in one respect is quite different. About 11:00 a.m. two dining car boys came through and distributed "Table d'Hote" cards. You then take your choice of the time you wish to have lunch served. This avoids the crowding of the diner and long waits in the walk-ways. The service is very good and very reasonable. Today we paid for lunch Yen 1.50 Sen.

The lunch consisted of fish, stuffed turnips with tomato sauce, peas in the pod, beef and creameddasheens, with cabbage and shredded carrots, bread and butter and assorted fruit.

From Tokyo to Okitsu we were more or less familiar with the country along the railway, for we had been over it earlier in the season when we made a trip there to visit the Experiment station. The crop andseasonal conditions, however, are much different from what they were then. Cherry blossoms have gone, but azaleas on the banks and hillsides, which to a certain extent take their place, are in their glory. Iris on the house ridges are in bloom, rice seed-beds are planted and in most instances the plants are up. Wheat is turning a golden yellow and will soon be ready for harvest. Rice paddies here and there are being plowed, harrowed and filled for the setting. Between the rows of rice, other crops which were previously set out are making a good showing. These inter-plantings included cucumbers, soybeans, tobacco and several other things which I do not recall.

On the hillsides we saw numerous flowering trees and vines, and some of these were very handsome. Especially the azaleas and Deutsia. On the way up the grade at Suruga before reaching Fujij station, we saw some beautiful white flowered plants. Our interpreter, Mr. Kurihara said that he thought they were a species of deutsia. I am doubtful if he is correct for to me the petals appeared too large for any of the Deutsia with which I am familiar. Between Suruga and Fuji I believe it was near Gotemba, we saw a wonderful wisteria vine covering several trees on a bank. This might be a good

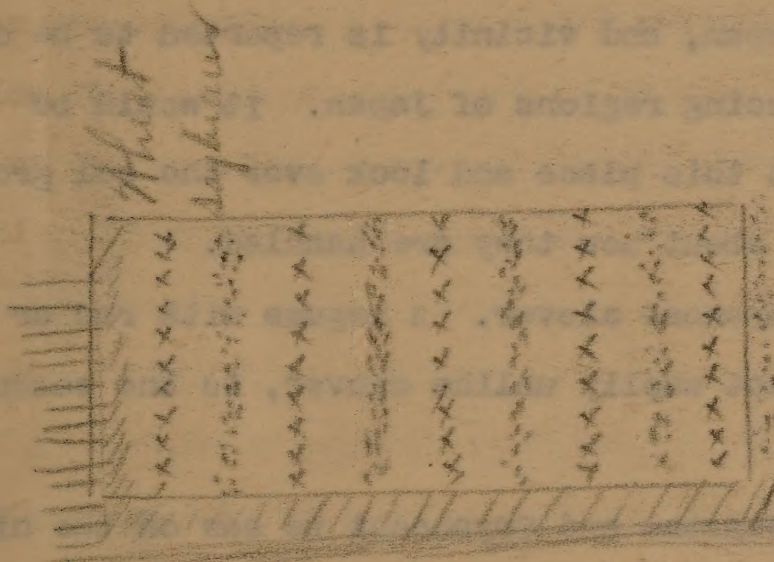
Wednesday, May 22, 1929 (cont.)

place to collect seed of this wild species.

Along the line in both directions from Fuji the numerous peach orchards which were pink with bloom when we went to Okitsu April 4th are now in full fruit and in many instances the fruit has been bagged to protect it from injury.

Tea. Beyond Okitsu en route to Kyoto, for a good distance we saw tea in abundance, and in many instances it was being picked. We also saw a lot of tea at Hamamatsu.

Soybeans. We also saw for a considerable distance beyond Okitsu, what looked to me like soybeans, planted separately and inter-planted with wheat, in rather small, narrow thrown-up beds.



We also saw plantings of soybeans, cucumbers and other plant crops planted on ridges, with from a few inches to a foot or so of water in the trenches between these ridges.

It is difficult to understand how such good crops of wheat, (of apparently several distinct varieties), cucumbers, peanuts, soybeans, and a number of other crops can be so successfully grown on land, which in many instances, is not more than a foot above the rice paddy. Probably it is a case of selection and adaptation. The wheat, bearded and otherwise, is as a rule good and is being grown to a very much greater extent than I had any idea that it was. Mr. Kurihara, our interpreter, expressed the belief that wheat as a crop in Japan is second in importance to rice.

Buckwheat. Between Okitsu and Kyoto, we saw quite frequent small plantings of buckwheat. We understand that this is also quite an important crop, especially in some sections of Japan.

Eels. Hamamatsu, Japan, and vicinity is reported to be one of the big eel producing regions of Japan. It would be interesting to visit this place and look over the eel grounds and learn something about how they are handled.

Rengo. So called Japanese clover. A legume with red or deep pink flowers, not wholly unlike clover, is the commonest grown manure crop.

Azalea. Between Hamamatsu and Toyohashi we saw on the hillsides along the Railway, a very attractive dwarf variety of pink or salmon colored azaleas. This might be an excellent place to secure seed. This is also true of the region about Futagawa. Also between Araimachi and Washizu.

Persimmons. Ogaki is about the center of a good sized persimmon region, but we saw only scattered trees and no extensive orchards like those we saw in China.

Wednesday, May 22, 1929 (cont.3)

After leaving Toyohashi we came into an extensive mulberry growing section. wheat and perhaps barley are also extensively grown here. We asked Mr. Kurihara about the extent to which Japanese farmers are interested in sericulture, he estimates that more than 50% of the Japanese grow silk worms.

Yaiabara is located in a mountain district, lookslike it would be an interesting place to do Agricultural Exploration work.

We arrived in Kyoto about 8:05 p. m. and went to the "Miyako Hotel", American plan.

Wednesday, May 22, 1929 (Cont. 4.)

Copied from Mr. Morse's diary:

En route. We awoke about 6 a. m. in order to enjoy the mountain scenery. On the hill and mountain sides, along the railway, and even along the rice paddies wild azaleas were in full bloom. In one section for several miles the rice paddies were laid out in rectangular form, about one-tenth acre in size, which differed quite markedly from the irregular forms of paddies we are accustomed to see about Tokyo.

About 7:30 we went to the diner which was quite similar to American diners and had the regular breakfast consisting of buttered toast, oatmeal, and milk, ham and eggs, fruit (apples and bananas), and tea or coffee.

As we passed along many beautiful wisterias extending to the tops of tall trees and spreading over a considerable area were noted. Peaches and pears were in full bloom. ✓

At Ichinoseki, we purchased from a lunch boy, some soybean products. This place is said to be a center of productions of a large number of soybean food products. It is in the Iwate-ken prefecture which is second in soybean acreage and production in the Japanese Empire. An agricultural college is located at this place. After leaving Ichinoseki many fields, some quite large, of chinese cabbage in full bloom were noted on each side of the track. These fields of cabbage are being grown for the seed which is used for oil production. Many pear orchards were noted through this section.

The section around Hanonaki is rather a noted horse

raising region. Shortly before reaching Morioka many persimmon trees of large size were noted and also several persimmon orchards. We were in a rather mountainous region where considerable lumber operations were being carried on. In the rivers many lumber rafts were floating down. This mountainous section soon gave way to a general farming region, more or less hilly, but extensively cultivated in soybeans, adzuki beans, rice, barley, wheat, apples, pears, peaches and persimmons. About 12:15 p. m. we came to a section where soybeans and adzuki beans are grown very extensively. Much of the land had already been planted in these crops though we saw some planting being done. The beans were planted in rows on ridges about 18 inches apart, and after planting the ridges were packed by tramping as indicated by the close foot prints the entire length of the rows. The mountains were snow-capped and in some cases extended more or less down the sides.

About 12:30 we went to the diner and took the regular tiffin. The menu was in French and Japanese, and was as follows: Bread and butter, fish cake with tomato sauce, baked cucumber stuffed with chopped meat, cold roast beef and potato salad, fruit (apples and bananas), coffee and tea.

We entered the Aomori prefecture about 1:30 p. m. and noted a change in the crops. Quite extensive apple and peach orchards on the hillsides and in the valleys and were in full bloom. Many large persimmon trees were noted on both sides of the railroad since we entered this prefecture.

When about two hours from Aomori we passed through an extensive stock raising region, mostly horses, however, rice was the principal crop being grown. Along the railroad

Wednesday, May 22, 1929 (cont. 5).

embankments the wild lily-of-the-valley was growing abundantly.

We arrived in Aomori at 4:27 p. m. The railway and ferry stations are in the same building. We had about an hour to wait as the ferry would leave at 5:30 p. m. for Hakodate, Hokkaido. Some interesting shops were found in this building and many bean and fruit products were found. The military police at the station were interested in us and asked Mr. Guyetake concerning us. Aomori is in a fortified zone and therefore foreigners are under watch and sketching, taking pictures, etc., are strictly forbidden.

The ferry boat which also carries trains between Aomori and Hakodate, is a large excellent steamer with all modern conveniences. About 6:00 p. m. we went to the dining room and had the following supper: soup (broth with egg), bread and butter, broiled salmon, slice of cold tongue with tomato sauce and slice of cold roast beef with browned potatoes, slice of sponge cake, apple, coffee or tea.

We arrived at Hakodate at 10:30 p. m. and went direct to our sleeper in the ferry building. The following is a card which is brought around on the train to announce tiffin or dinner as the case may be.

御案内

お夕食の用意が

整ひました

御好み料理は

御定食後手左

御案内申します

仙台ホテル列車食堂



THE DINNER IS READY. SENDAI HOTEL DINING CAR

Card announcing the serving of tiffin on the diner
to Aomori, Japan.

Thursday, May 23, 1929.

This proved to be a hectic day for Mr. and Mrs. Beattie,, Mr. S. Kurihara (interpreter) Mrs. J. H. Dorsett and P. H. Dorsett. Last night we arrived in and remained at Kyoto and all left there at 8:13 a. m. this morning for Kobe, where Mr. and Mrs. Beattie expected to take a steamer for Tientsin, China, en route to Peking.

We went from the hotel, "Miyako", to the station in a down pour of rain. On arriving at the station, Mr. Beattie turned all of his hand baggage over to the "Akibo" or Red Cap porter. These porters, here in Japan, are considered exceptionally reliable, and no doubt are (especially if they understand. This is also quite true in the U. S. and in other countries). In this instance there was apparently a misunderstanding for when we went to board our train, neither the Akibo nor the baggage was to be seen. We thought probably he had put it on the train, so as it was pulling out, we all stepped aboard and proceeded to try and find the baggage, but it was not there. Mr. and Mrs. Beattie's steamer was due to sail about noon and the 8:13 train (express) or the 8:20 local were the only trains on which we could make the trip in time to catch the steamer. We decided that there was but one thing to do and that was to get off the train at Osaka, the next stop, (the train arriving there at 9:00) and get the 9:03 back to Kyoto and locate and get the baggage then arrange to catch the steamer Friday at Shimonoseki. This was finally done. We had the novel experience of riding from Kyoto to Osaka and back four times on the same ticket.

Between Kyoto and Kobe, the farm products include wheat, vegetables, opium poppy, rice, buckwheat, and a few horticultural fruits, peaches and pears primarily.

The country is not sufficiently interesting to necessitate our again visiting there.

At Mr. B. P. Walker's English Mission School on the Tor Road at Kobe, is one of the best weigelia bushes we have seen. It was in full bloom and the masses of pink and white flowers were wonderfully handsome. We believe that this is well worth trying to get cuttings of. At Mr. P. Gasile's Yomoto Dori Sanchrome, a little further up the street and on the right hand side of the street (the weigelia is on the left) is a fine yellow flowered plant. The flowers are of a clear bright yellow and resemble jasmimine. It is a handsome thing and if not already in the States is worthy of getting for trial. We left Kobe on the 8:54 train for Kyoto where we arrived at 11:02 p. m., and the Beattles left Kobe at 8:56 p. m. for Shimonoseki to catch their steamer for Tientsin, China.

Copied from Mr. Morse's diary:

We were awake about 6:00 a. m. this morning and our first view of the country reminded us very much of New England conditions. Farming was being carried on more extensively, that is larger fields. The farming land was quite hilly with a background of mountains, the tops and sides of which were covered with snow. In the farm yards patches of tulips and narcissus were in bloom, and on the hill and mountain sides many wild cherries in full bloom were noted. From the appearance of the fields and planting operations, it was evident that we were passing through a large potato growing

Thursday, May 23, 1929. (cont 2)

section.

About 7:30 a. m. we passed along the shore of the Japan Sea. It was evident, from the numerous fishing boats along the shore, and the many nets, that fishing is carried on extensively. In the yards of the fishermen's homes large quantities of fish were seen drying on poles. Mr. Suyetake advised that the fish were herring and used entirely for fertilizing purposes. As we passed along a silo was noted here and there. Many dairy herds, fairly large and of the Holstein breed, were seen. We passed through Otaru which is said to be a rather large commercial center and has a very extensive trade in soybeans and soybean products.

We arrived at Saporo about 7:45 a. m. and went at once to the Yamagataya Inn, which had been recommended to us by Mr. Beattie. After looking at the foreign rooms, containing European beds and chairs, we decided that the Japanese quarters would be more comfortable.

After breakfast of fruit, ham and eggs, toast, coffee and milk, Mr. Suyetake went to the Agricultural department of the railroad and obtained bulletins on the Agriculture of Hokkaido. Later we went to the two parks to see the cherry blossoms, but found out that nearly all of the flowers had fallen. At one of the parks, Maruyama Park, tonight was the last night of illumination and celebration of cherry blossom time. The park contained many hundreds of cherry trees and no doubt was quite beautiful when the cherry trees were in full bloom. Cherry blossom festival must have

been celebrated in a large way for temporary stands, tea rooms, and booths were all about, sake places predominating. At the side of the park there was a very beautiful shrine with a long avenue of cherry trees to the gate. Nearly all of the blossoms had fallen and the leaves were well out so that cherry blossom pictures were out of the question. About all the cherry trees were of the single pink variety.

Friday, May 24, 1929.

This morning Mr. Kurihara and I visited the Kyoto wholesale market (fruit and vegetable) and listed the fruit and vegetables seen.

Fruits.

Oranges in variety.
California lemons.
Apples
Kumquats.
Bananas, from Formosa.
Cherries, red and almost white.
Watermelon.
Kin Kan.
Loquats.
Strawberries, very large.
Pears.

Vegetables.

Shino gobo.
Turnips.
Daikons.
Mitsuba.
Lettuce, leaf and stalk.
Cabbage (like ours).
Radish, roots & tops.
Burdock.
Dasheens.
Yams, at least 2 varieties.
Ginger, roots & forced.
Bamboo sprouts in variety.
Sauntro (?).
Carrots in variety.
Green peppers.
Egg plant.
Jap anese spinach.
Seedling carrots used as green.
Cucumbers.
Udo.
Matsuna.
String beans.
Onions, fresh and bulb.
Fuki.
Lotus, roots (Rekon).
Horse radish, Japanese.
Squash.
Mushrooms, wild & forced.
Potatoes, white.
Potatoes, sweet.
Garlic, (bulbs).
Tomatoes.
Lily bulbs & fresh scales.
Sansho seed for seasoning.
Japanese garlic.
Dasheen leaves for greens.
Dasheen shoots.
Fresh seaweed, Hiru.
Gourds.
Dioscorea, long & round.
Dried daikon.
Actade green.
Fern fronds.
Junsi.
Pickled seed of sanshu.

Vegetables (cont.)

Beni tade, dark pink and green.

Chiso.

P aralogy.

Kamouri.

Asp aragus.

Broad beans.

We saw quantities of fine large strawberries in boxes about 5" x 9" x 12". They were selling at auction, wholesale, at Yen 1.10 per box, about 55 cents in U. S. Gold.

In the afternoon we went out to the Agricultural Experiment Station to meet some of the men, especially the Director of Horticulture.

After crossing the Kamo River we saw a fine hedge of a single white rose which we were told is Hatoya bara. The flowers are of good size and white, occasionally with pink or redish tinged petals. We were unable to learn whether or not this is a native or introduced, however, it's a good single rose and we will later try to secure cuttings for sending home.

At the Experiment Station we met Prof. Hamizo Niimi who is Prof. of Forestry. He introduced us to Mr. H. Koda, who was in the field with a class of students. We hope to have the pleasure of meeting him again.

We were then introduced to Prof. Umasuke Morishita, Director of the Horticultural work of the Kyoto Prefecture. We found him most interesting and from our conversation of a couple of hours with him, feel that he is exceptionally well informed, and especially so with kaki persimmon.

In response to our question about stocks for the commercial varieties of persimmon, he said that now seedling kaki from the variety Hachiya are used in place of seedlings of the wild

Friday, May 24, 1929 (cont. 2).

persimmon "shauonogaki" The former, he says, gives a longer life tree. They are trying out at the Station 10 of the best of the commercial varieties. The trees are headed low, like peaches in California, and are kept pruned low. He said that in some sections growers prune their trees so as to cause them to fruit in alternate years, and that they have not only found the practice cheaper, but also that they get a more regular crop and on an average realize better and more uniform prices. These are both interesting facts.

He gave us his opinion that Fuyu, Tenjin, Goshu, Jiro, Ogash, Gorho and Hara goshu are the best non-astringent varieties and Nishirazo, Olzu, Hachiya, Dojo Hachiya and Koshu Hyakusai as the best of the astringent varieties.

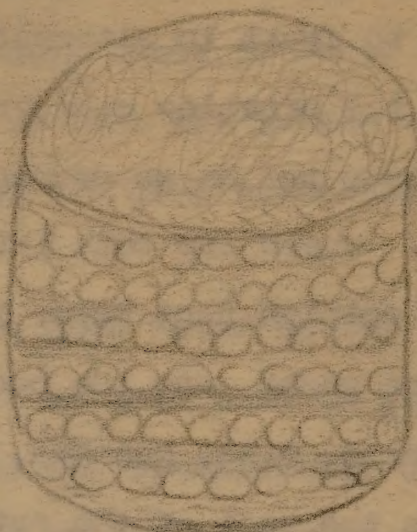
Fuyu, he said, is a descendent from any one or a combination (he does not know which) of the following: Miya goshu, Hara goshu, Shenonome, goshu or kaido goshu, and that there is considerable confusion about Fuyu and its origin.

Prof. Morishita told us of an interesting practice of Japan. In some sections of Japan, at the time of marriage, the bride presents her husband with a small persimmon tree. He also told us an interesting story regarding the origin of the Japanese practice of curing or ripening persimmons by the sake barrel method.

In some way a winery or sake maker started putting a green persimmon in each barrel of sake to clear it, and because of the alcohol, it would not spoil. One day a bad boy bit

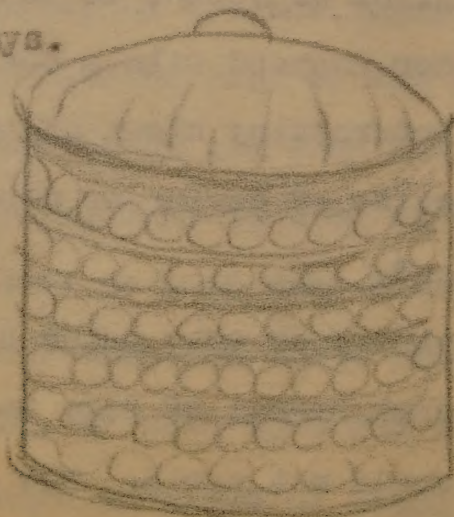
into one of these persimmons that had been in the sake barrel and found it sweet and good. From this the sake practice or method of ripening persimmons was evolved.

Prior to this treatment, persimmons were ripened by placing them in containers with layers of rice straw or buckwheat straw between the layers. Like this:



After the straw and persimmons are filled in the container is filled with hot water at a temperature of 20° to 25° C. and allowed to remain for 12 to 15 hours.

The sake cask method replaced this, it is simple and effective. An empty sake cask in which sake has been standing, is filled with the fruit, then tightly covered and allowed to remain for 5 to 7 days.



Friday, May 24, 1929 (cont. 3).

There is sufficient sake in the wood of the cask to cause the persimmon to ripen within the time noted.

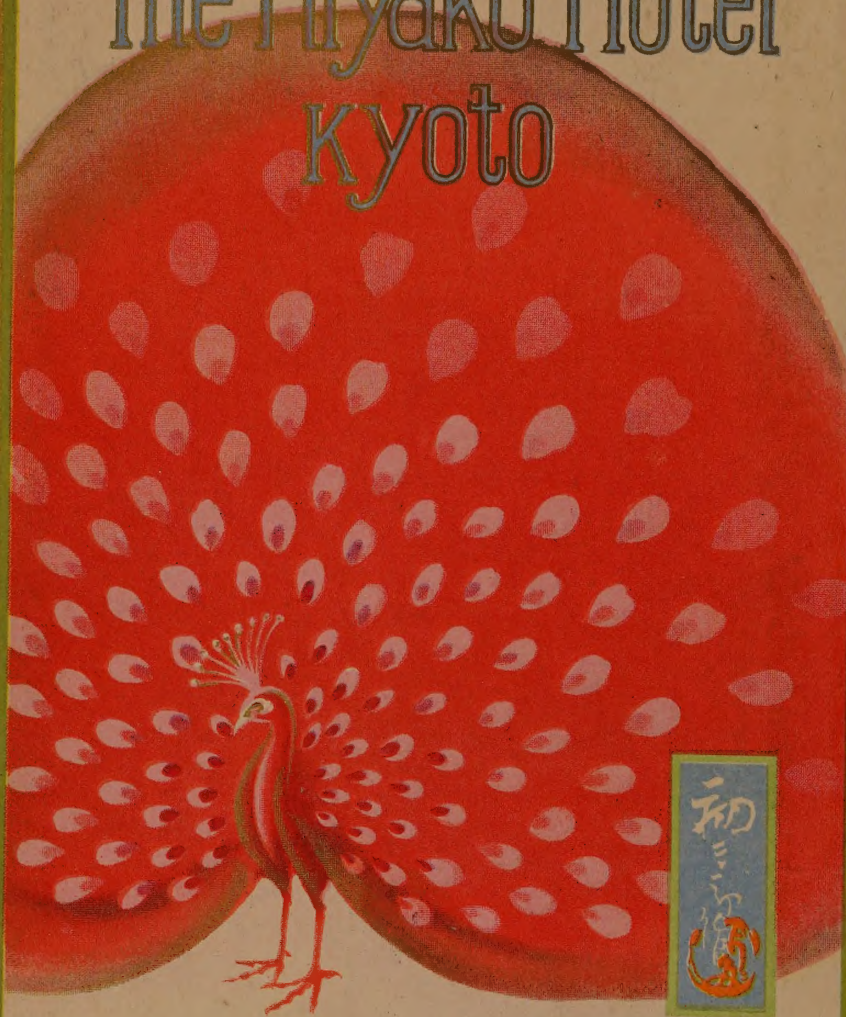
A more recent practice now in operation is a modification of this last practice. About one-half of the adhering calyx is cut off and the base of the fruit is then dipped into sake, the fruit is then packed into containers which can be closed tightly, and kept in that condition for 5 or 6 days, they are then ready for eating.

Prof. Morishita is growing about 10 of the principal commercial varieties at the Experiment Station. These trees look to be 10 or 12 years of age and are in good condition, but we would say entirely too close. The limbs are interlapping now. The trees do not look to be more than 12 to 15 feet apart.

An illustrated map and description of Kyoto and vicinity follows, as do any pictures made today.

Exhibit #1

The Miyako Hotel Kyoto



Japan.



negative # 43727.

Panoramic view from the fourth floor of the Miyako Hotel,
Kyoto, Japan, showing a portion of the city and nearby
country.

Friday, May 24, 1929 (cont. 4).

copied from Mr. Morse's diary:

We had planned to visit the Agricultural Experiment Station at Kotoni but it had rained quite hard during the night so postponed our trip. The morning was spent at the Sapporo Botanic Garden which is under the supervision of the Imperial Agricultural college of Hokkaido. We first visited the famous museum which contains a small but good collection of the fauna of Hokkaido. In addition there were good collections of birds, insects, fish and minerals, and a very good exhibit of Ainu relics.

The Botanic Garden was well laid out and contained a large and excellent collection of trees, shrubs, and other flowering plants, all labeled. Many cherry trees of different varieties in full bloom were found in quite attractive settings and some movies were made of these. We found many plants of which specimens were desired.

After lunch we visited Dr. S. Ito, who is Professor of Phytopathology and Mycology, Director of the Sapporo Botanic Garden and Chief Phytopathologist of the Hokkaido Agricultural Experiment Station. Dr. Ito went with us to the Botanic Garden and made arrangements for us to collect whatever plant specimens we desired. We were shown over the entire grounds by Dr. Ito and his assistant and found large collections of all kinds of flowering plants which grow wild in Hokkaido. There were also large plantings of varieties of tulips, narcissus, peonies, iris, etc.

Among the most striking plants and of possible value in the United States were:

Friday, May 24, 1929 (cont. 5).

Iris sibirica, var. *orientalis*, this is a dwarf variety about 8 inches high, with a dark purple flower. It is used extensively in the wild flower beds of the Botanical Garden as a bedding plant along the paths. In addition to its value as a bedding plant it should be of value as a decorative plant for small pots.

Aquilegia skitensis. This is a large blue aquilegia with the center petals tipped with yellow and grows wild in the high mountains of Hokkaido.

Fritillaria pallidifolia. A bushy plant about 30 inches high and with very large beautiful yellow flowers.

The following varieties of lilies are grown in a bed: *Lilium Harrisoni*, *L. melecoloides*, *L. tigrinum*, *L. Henryi*, *L. speciosum* and *L. divaricum*.

Fritillaria camschatcensis. This is called the wild black lily and grows wild in Hokkaido.

After supper we went to the main business street and found a very busy street, much like the Ginza in Tokyo at night. The various stores and booths were very interesting and many vendors, mostly women, were noted selling plants, flowers, and shrubs many of them wild species.

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Saturday, May 25, 1929.

This morning about 9 o'clock we went over to the College of Agriculture, Kyoto Imperial University.

We first met Dr. Takewo Hemmi, the pathologist, who speaks English very well and personally knows a number of our Department workers. Dr. Hemmi in turn introduced us to Prof. Namikawa, who is in charge of the Horticultural work of the University and especially interested in kaki persimmons. A little later we met Prof. Akio Kikuchi, who is in charge of the pear work of the University. Prof. Kikuchi has upwards of 1500 hybrid pears from hand pollination, under observation. These are the result of crosses with American, European, Chinese and Japanese varieties. The trees look to be about 5 years old and at this time appear in excellent condition.

Prof. Namikawa has about 100 varieties of the kaki persimmon, 5 years of age under observation. He tells us that there are fully 130 varieties of persimmons in Japan. He also tells us that seedlings of the wild persimmon, Diospyros lotus, is what is generally used by nurserymen as a stock upon which to bud or graft the commercial varieties of persimmon. He apparently was successful in saving some of the persimmon varieties of American persimmon for we saw scions which had been worked on rather old trees of Diospyros lotus beginning to push.

The trees here, like those at the Agricultural Experiment Station, are headed low and pruned back quite severely, at least we would consider it severe pruning for persimmons.

We had lunch with Dr. Hemmi, Prof. Namikawa and Mr. Kikuchi at the University Club.

They have a very nice club building and the luncheon and service were very good indeed. After lunch we said goodbye to Dr. Hemmi and Mr. Kikuchi and with Prof. Namikawa went first to visit the Ginkaku-ji Temple, property of Jishoji, which is in the village of Jodoji-mura, outside the N. E. end of Kyoto, at the base of a range of hills or mountains forming a spur of Hieiizan. The two-storied building called Ginkakujii or silver Pavilion, is said to have been covered with silver at one time. It was built by an old priest in imitation of the "Kenkakuji" or Golden Pavilion.

After removing our shoes at the threshold we were shown through the temple, and its interesting features and sliding screens explained by a Japanese attendant or priest. We saw the room in which the first Tea Ceremony was performed. The room was built in accordance with the canon prescribing $4\frac{1}{2}$ mats as the proper size for tea rooms. (A mat is 3' x 6').

After going through the temple and being served with tea we donned our shoes and strolled about a beautiful small garden at the base of densely forested hills.

There is a curiously shaped heap or pile of white sand in the garden, the top of which is always kept raked in a peculiar fashion. This is called "Gin shadan" or the Silver Sand Platform. Here Yoshimasa (the priest) used to sit and hold esthetic revels. There is also a small circular pile of white sand behind the larger one which is called the "Ko-gotsu-dai" or Mound Facing the Moon, this is where he used to moon-gaze. There is a lake, of course, as in all temple gardens, and as is usual each stone, each bridge, each tree of any size, has its name, the little bridge is the bridge of the pillar of the

Saturday, May 25, 1929, (cont. 2).

Immortals, etc. 不老の庭

We would have greatly appreciated being able to make a few pictures here, but as this was not possible we purchased a few post cards to use as exhibits to give something of an idea of this fascinating and interesting garden, and these are followed by the pictures we made on this date.



Ginkakuji, Kyoto.

泉 林

(寺閣銀都京)

When Yoshimasa held forth in his esthetic revels. This view is from the Silver Pavilion side, and shows first the flat round pile of white sand and farther back the larger pile of sand. To the right is a portion of the small lake and the bridge of the Pillar of Immortals and beyond these the Temple and forest-covered mountain side.



Ginkakuji, Kyoto. (物造建護保別特) 寺閣銀都京

This view shows the Silver Pavilion at the edge of the lake. None of the silver is remaining on the building, however.



Ginkakuji, Kyoto.

門 唐

(寺閣銀都京)

Entrance gates to the Ginkakuji Temple and the Silver Pavilion at Kyoto, Japan. The shrubs and trees are most pleasing.



Ginkakuji, Kyoto.

關玄及門唐

(寺閣銀都京)

Portion of the small but attractive and fascinating garden at the Ginkakuji Temple, Kyoto, Japan.



Ginkakuji, Kyoto. (物造建護保別特) 堂求東及堂本 (寺閣銀都京)

Another view showing a portion of the small lake, and nearby are some of the Temple buildings.



Ginkakuji, Kyoto. 臺月向及灘沙銀 (寺閣銀都京)

In the foreground the curiously shaped pile of white sand with its straight bands raked in this manner always. This is the Silver sand Platform.



Negative #43702.

View along one side of one of the several lakes in the Heian Jingu Shrine grounds at Kyoto, Japan. It shows blooming iris and natural setting and beauty of the place.



Negative #43703.

View from the west side of a small lake in the grounds of the Heian Jingu Shrine at Kyoto, Japan, showing water lilies, iris and the natural beauty of the place. Note the reflections in the lake.

Negative #43704.

A nearby view of water lilies and to the left other water plants also iris in bloom and some of the surrounding native vegetation in the Heian Jingu Shrine Grounds at Kyoto, Japan.





Negative #43705.

View along one side of a second lake in the Heian Jingu shrine grounds at Kyoto, Japan. This in nature was a fascinating scene and even here is quite pleasing.

Negative #43706.

A fairly nearby view of rather dark purple iris and another large leaved water plant. The stones in the background are flag stones or stepping stones for crossing the lake. see picture #43707.





Negative #43707.

View over the flag stone walk at a narrow portion of the lake. They are shown in picture #43706. The bird home on the side of the pine to the left was not noticed until after the print was made. This is a delightful scene.

Negative #43708.

View from among the trees and shrubs on the North side of the largest of the several lakes in the grounds of Heian Jingu Shrine at Kyoto, Japan, showing a portion of the lake, the Pavilion bridge, and Higashiyama (East Mountain) in the background.



Saturday, May 25, 1929.

Copied from Mr. Morse's diary:

Sapporo, Japan. In the morning we went to see Dr. Ito again regarding agricultural work in Hokkaido. We were advised by him that the wild persimmon does not occur in Hokkaido and kudzu grows wild in the southern part of Hokkaido. We were shown a bulletin, "Vegetation of yezo," written by Dr. Y. Kudo and published in the Japanese Journal of Botany, Vol. II, No. 4, Tokyo, 1925. This work gives rather a complete survey of the flora of Hokkaido by prefectures. We were unable to obtain a copy but Dr. Ito thought by writing Dr. Kudo who is now at an experiment station in Formosa that we might obtain copies. The Manchurian bush cherry, Prunus tomentosa, does not occur in Hokkaido.

Inquiring as to Rhododendron Albrechtii (B. Y. Morrison is interested) showed that a specimen was grown in the Botanic Garden and we would be able to obtain plants and seed. The species of Rhododendron growing wild in Hokkaido are: Rh. albrechtii; Rh. brachycarpum; Rh. chrysanthum; Rh. dauricum; Rh. Kaempferi, and Rh. Kamtschaticum. We were also promised aid in getting plants of Rh. Albrechtii by the Yamato seed Co., and a small nurseryman and seedsman near the entrance to the Imperial University grounds entrance.

After our visit with Dr. Ito we went to the Natto Laboratory of which Dr. Hanzawa is in charge. We were given bulletins regarding the history, making and varieties of Natto, and served bottles of different sizes of Nattokin (liquid pure culture) for the making of different kinds of Natto. We were then shown the various forms of Natto and

taken through the various rooms and given detailed information on the various steps involved in the production of Natto.

After our college visit we stopped at a small nurseryman near the college campus entrance and found that he specialized in lilies. At the present he is growing about 20 varieties and species of lilies about 2 miles from Sapporo and can obtain from 20 to 25 more species and varieties, representing wild lilies of Hokkaido.

Sunday, May 26, 1929.

Left the Miyako Hotel at Kyoto Japan about 8:40 this morning for a trip over Mt. Hiei to Lake Biwa. Arrived at the Demashi Yanage, Incline Ry. Co.'s Station on the west side of Mt. Hiei about 9:23. It took about 9 minutes to get to the landing some 800 or 1000 feet above the base. Here we had a most wonderful view of the mountains and valleys and also of Kyoto. We made 2 panoramic views from here and hope they prove to be o. k.

We collected some herbarium specimen on the way up. At the top we took readings of our altimeter and thermometer which was set at) at Kyoto. The temperature was 70° F., 22° C., and altitude reading 2,450 feet. It took us between three and four hours to walk over from the landing on the west side to the station at the top of the incline on the East. We made a few pictures on the way up and at the top and also on the descending side, and tried a few at some of the old temples. We also collected herbarium specimen from plants along the trail and got seed of two or three interesting plants. We were told that persimmons are grown to a considerable extent in the foot-hills about Lake Biwa, and when Mr. C. C. Thomas joins us in September we hope to make a trip through this persimmon growing region.

On our arrival back in Kyoto, at 4:30 p. m., we secured our baggage and rushed to the Railway Station to catch the 5:15 train for Nara where we arrived about 6:35 p. m., where we expect to remain for a couple of days.

We spent a glorious day on the trail over Hieizan. The

very on the way up, at the top, and going down on the
e Biwa side, was superb and very much enjoyed. We saw
e fine specimen of cryptomeria japonica on the Lake Biwa
le, a few of these are shown in some of our pictures.

such of those made during the day's tramp follow:



Negative #43709.

Mr. Yuri Yamaguchi who carried a good part of our
baggage on our trip from Kyoto to Lake Biwa, over
Hieiizan.



#43710.

Our "Abosan" or coolie woman,
shown in picture #43709,
with four of our cameras.

#43710.

#43711.

En route down Mt. Hiei on the
Lake Biwa side. To the left
of the lady on the walk is a
dwarf bamboo.



Negative #43711.



Negative #43712.

#43712.

Mt. Hiei on Lake Biwa side,
this was a glorious view,
but the picture does not show
the lovely sight.

#43713.

From the Lake Biwa side of Mt.
Hiei at Kyoto, Japan, another
disappointment.



Negative #43713.



Negative #43714.

An old Temple on the lake Biwa side of Mt. Hiei,
at Kyoto, Japan. A beautiful azalea, pink, at the
left, and an American girl at the cleansing fountain
in the temple grounds.



Negative #43715.

The old Temple on Lake Biwa side of Mt. Hiei, Kyoto,
Japan. The pole suspended by 2 chains on the right is
for ringing the Bell.



#43716.

Mt. Hiei on Lake Biwa side,
another vista and another
disappointment, other than
the two fine tree trunks.

Negative #43716.

#43717.

Entrance to the Temple on Lake
Biwa side of Mt. Hiei, Kyoto,
Japan.



Negative #43717.



neg # 43722

Sakanoto, a small village of Lake Biwa side of Mt. Hiei.
 A bower of roses on a house top. Somewhat resembles
 "silver Moon", but flowerstems are covered with thorns,
 It's a beautiful rose!



Negative #43723.

A beautiful Temple situated on Lake Biwa side of Mt. Hiei, Kyoto, Japan. A lovely location among these beautiful cryptomeria japonica. The small building in the background is the Bell tower.



Negative #43724.

A similar view to #43723, but only showing portions of the road in that picture.

Negative #43725.

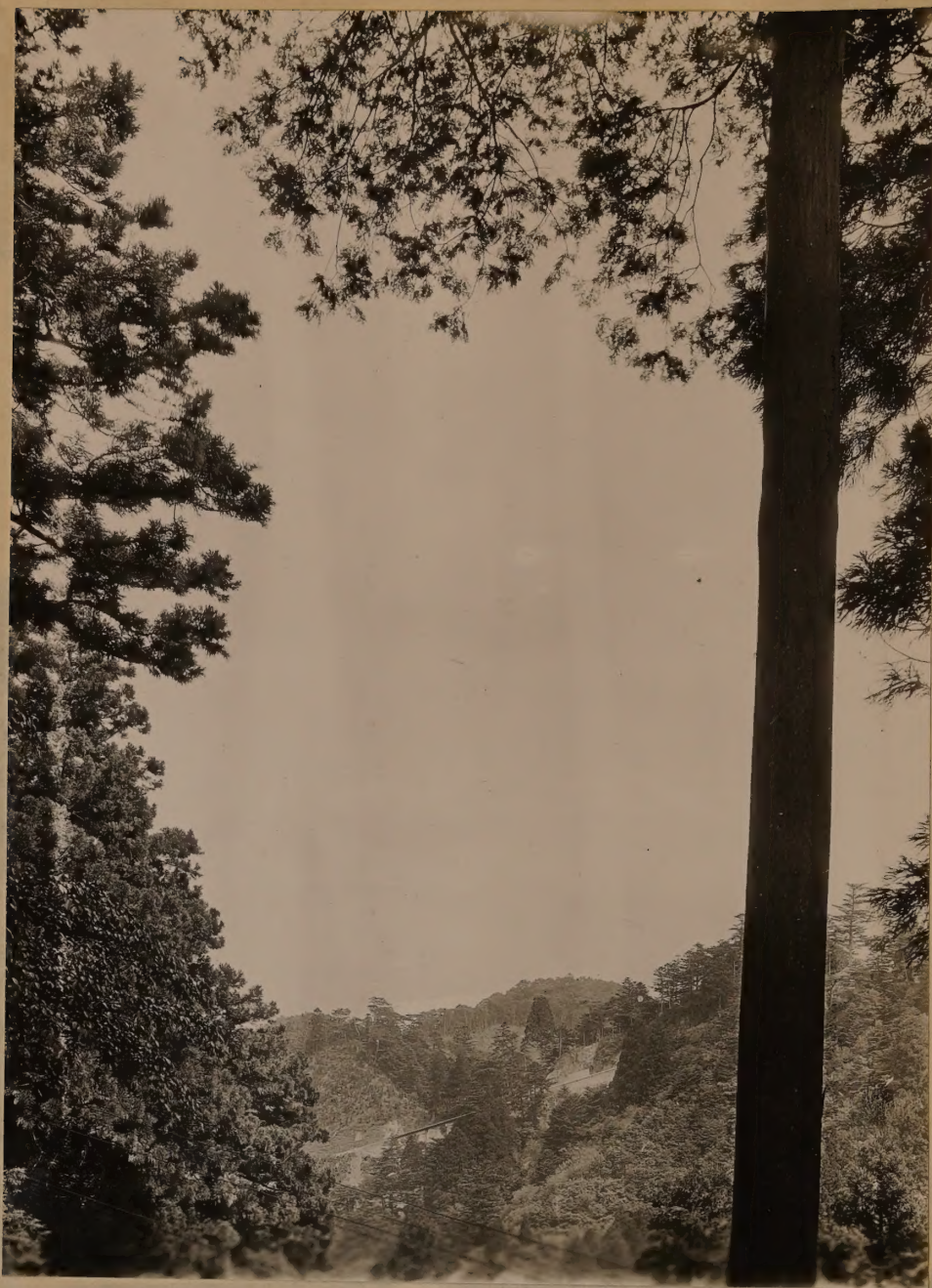
View nearer to the Temple showing the two roofs and
a better view of the Bell Tower. Kyoto, Japan.





Negative #43726.

View at the back of the temple building. Taken
primarily to show the fine specimen of cryptomeria
japonica. Kyoto, Japan.



Negative #43727.

Another vista, but showing little but the framing of the picture. This was really a marvelous view.



Negative # 43728.

View from the Incline Cable Station at Hieiizan looking
out over the peaks and valleys, Kyoto, Japan.



Negative # 43729. 75784 + image
 Panoramic view from the landing or near the Incline
 Railway Station, Mt. Hiei, out over the valley and a
 portion of Kyoto, Japan.



Negative # 43730.

4-98



Negative # 43731.

Another view from the top, but further to the left,
of Mt. Hiei showing in a panoramic view the mountains
and to the extreme right a portion of Lake Biwa.



Negative # 43731 a.

Panoramic view from the top of Mt. Hiei showing part
of Lake Biwa, mountains, and a portion of Kyoto, Japan.
Altitude 2450. Temperature 70°F , $\text{C } 22^{\circ}$.

The observations and train notes from the car window en route from Kyoto to Nara follow:

Between Kyoto and Momoyama Station we noticed kaki trees about the homes, but did not see any orchard plantings of persimmons. Between Momoyama Station and Kohata we saw many persimmon trees scattered here and there, and some of them were of very good size. We also saw many plantings of tea, practically all of which was covered with a frame work of bamboo poles and straw matting. We naturally assumed that this was a means of frost protection, but learned later that this is not the case. This protection is for the purpose of producing a certain grade of tea for which this region is famed.

Between Kohata and Uji we saw quite a number of bamboo plantings, more tea, trucking, wheat, barley and numerous rice seed beds filled with nice young seedlings which looked about ready for planting into the rice paddy areas. This is about the center of the "Uji cha", the famous tea of this section is grown almost exclusively for home consumption. We also saw here and there at the farmers homes one or more kaki trees about or near the house. Between Uji and Shinden the next station, we saw bamboo groves here and there, also plums, persimmons, peaches, tea, wheat and barley, grapes and general trucking operations and of course, rice seed beds at practically every farmer's home.

Along the route from Shinden to Tamamizu, in addition to the above we saw mulberries and broad beans in considerable quantity. The wheat and barley were in very many instances growing on ridges

Sunday, May 26, 1929 (cont.)

about one foot in height and in some cases there was water standing an inch or more in depth between the ridges.

The preceeding crops and conditions, with only slight local variations prevailed throughout the remainder of the route to Nara, where we arrived about 6:35 p. m.

Upon arrival we went to the Hotel Nara, which we found to be nicely located and also pleasant and comfortable.

Copied from Mr. Morse's diary:

Sapporo, Japan. In the morning we went to the Hokkaido Agricultural Experiment Station at Koton, where we met Dr. Takatsugu Abiko, chief of the Agronomy and Horticultural Sections. He explained to us in detail by maps, the different sections of Hokkaido where soybeans are grown extensively. He advised that most of the soybean experimental work is carried on at the Tokachi Branch Station, one of the northern stations.

We were shown the exhibit of various crop products grown in Hokkaido, and also the seed of new varieties of crops developed by the Koton station. This station is working with about 50 varieties of soybeans, and has developed two large very fine looking yellow varieties. We were also shown samples of about 275 varieties being grown at the station. Dr. Abiko assured us that we can obtain seed of all these varieties after harvest this fall.

There were exhibits of the principal insect enemies and diseases of the crops. The principal insect enemy of the soybean, and one which does much damage to the mature seed in the field is the "Mame shinkui ga" (moth into bean), a moth,

Laspeyresia (grapholitha) glycinivorella. It is a small moth, ~~knaxiarkaxefxwhichxautxintaxlxaxmaturaxbeanixxix~~

Laspeyresia (grapholitha) glycinivorella. It is a small moth, the larva of which cut into the mature bean. In general, it causes about 10% loss to the Hokkaido soybean crop. The early plantings are injured about 40% while the late plantings are only injured about 10%.

The principal soybean diseases which cause much damage to the crops, are a leafspot, "*Peronospora manschurica*" and a mosaic, "*Heterodera schachtii*."

The soybeans grown in Hokkaido are used entirely for food purposes such as Natto, bean curd, green vegetable bean, soy sauce, miso, bean paste and roasted beans.

About 16,000 acres of flax is being grown in Hokkaido and there is extensive flax work, especially breeding work, being carried on at the Kotoni station. Six varieties are being used, one from the United States, one from Russia, and four excellent varieties developed by the Experiment Station.

We went out to view the station experimental plots with Prof. Morio Tambo, expert of the Sugar Beet Department, who speaks some English. Considerable work is being done with potato breeding, especially with mosaic, and there were a very large number of plots of flax breeding work. Much work is being done in the greenhouses with vegetable crops such as tomatoes and cucumbers, and considerable floricultural work. Professor Tambo is doing much work with the breeding of sugar beets.

The station grounds are well laid out and the Experimental work being carried on is very extensive with the grains (oats, wheat, and barley), potatoes, soybeans, sugar beets, soybeans, garden beans, and adzuki beans.

Monday, May 27, 1929.

In the early morning we went through Nara Park and fed the deer. It is great to see deer wandering all about an unfenced park and the streets of Nara, and feeding from the hand of man. There are about 1000 tame deer in Nara Park.

After this most interesting feature of our trip, we went to Todaiji Temple and saw the Great Daibutsu, which has weathered two fires; 1st in the 12th century, and 2nd, in 1567, more than 370 years after the 1st rebuilding. This building, although reduced 66% of the old building, is 160 feet high; 188 feet frontage, and 166 feet in depth. It is said to be the largest wooden building in the world.

In addition to holding this distinction it houses the great Daibutsu, surrounded at the back with 16 other, but very much smaller Daibutsu's. The Daibutsu was created in 749 A. D. at the instance of the (45th) Emperor Shomu. It contains 437 tons of bronze, 288 pounds of gold, 7 tons of vegetable wax, 165 pounds of mercury and several thousand tons of charcoal. The gold and mercury were used solely for gilding(and now little of this is to be seen). Two years were required to cast the image. The image rests upon a bronze lotus flower.

Visitors are not permitted to make pictures within the Temple compound, therefore, we are employing post card views to give an idea of the building, Daibutsu and the big bell outside which was used to call the faithful followers of Daibutsu to worship.



Temple of the Great Daibutsuden of Todaiji, Nara, Japan.
 Footage 188 feet; depth 166 feet; height 160 feet 7 inches.
 This building looks to be in a pretty good state of preservation. Near the fence in the extreme left in the foreground, is where the early single flowering cherry tree stands from which we picked cherries today for seed which will go forward to Washington with our next shipment of plant material under #196. These cherries were picked with the consent of one of the priests of the Temple.



The great Daibutsu whose body height is 53 feet. He has 966 curls each 1 foot in height. Face length 16 feet in diameter $7 \frac{1}{5}$ inches. Face breadth $9 \frac{1}{2}$ feet. Lotus petals, 56 in number, 14 feet across and 15 feet in length. Nose length 1 foot $7 \frac{4}{5}$ inches, mouth breadth 3 feet $8 \frac{1}{2}$ inches, Ear length $8 \frac{1}{2}$ feet, thumb girth 4 feet $9 \frac{3}{5}$ inches. The diameter of the lotus on which the Daibutsu sits is 63 feet through.

奈良東大寺大鐘の上部
The Upper of Daibutsu Large Bell, Nara.



No. 19

Large Bell Tower to the west of the Todaiji
(Great Eastern Temple). Nara, Japan.



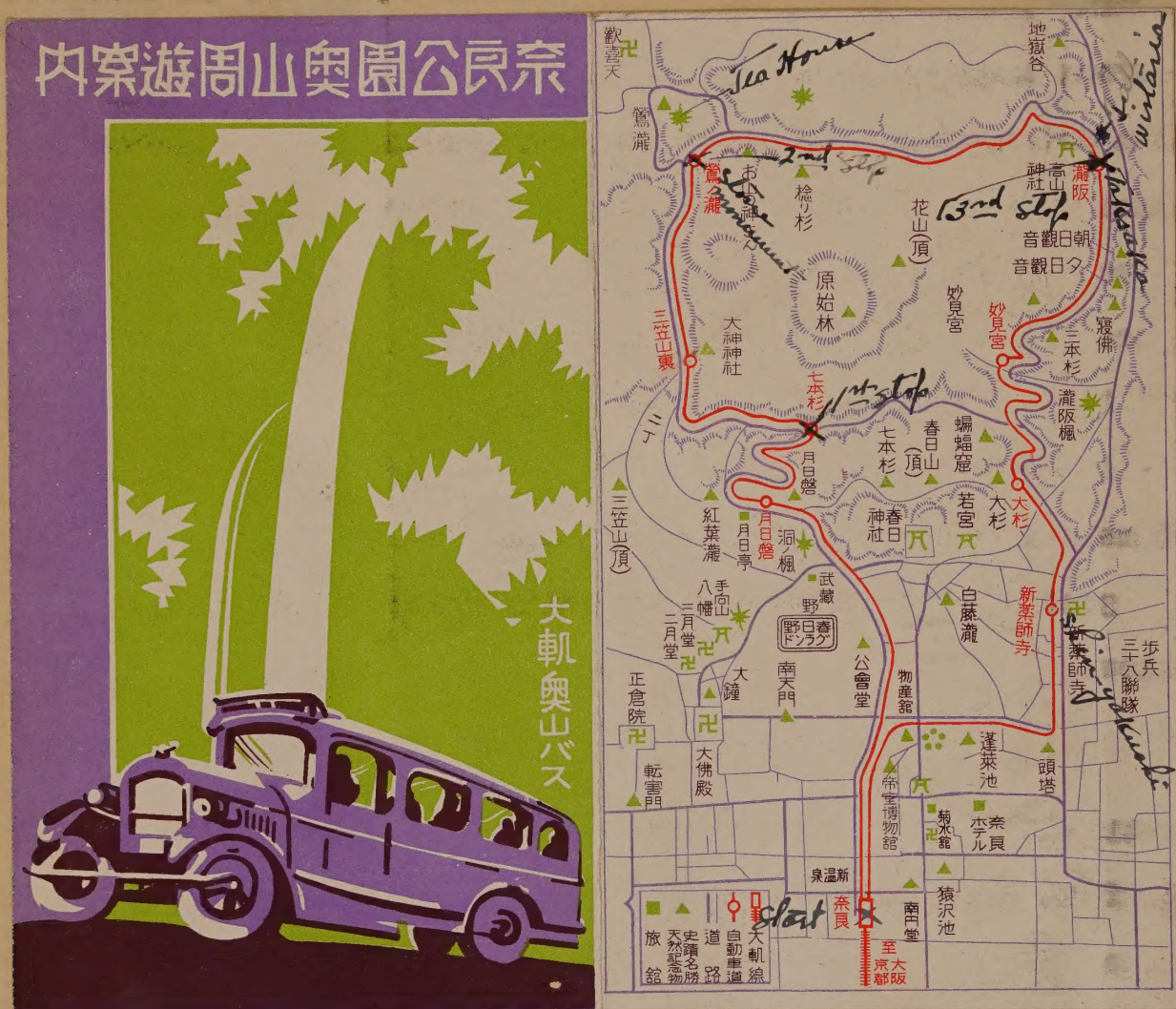
鐘穴の佛穴寺穴東良奈
The Large-Bell of Daibutsu in Todaiji, Nara.

No. 20

The Large Bell which hangs in the Bell Tower shown in the Exhibit before this. The bell was cast in 752. It is 13 feet and half inch in height, 10 inches thick at the rim; 27 feet in circumference and weighs about 48 tons. It is the third largest bell in Japan. (The first is at Shiten-o-ji Osaka and the 2nd at Chion-in kyoto, Mrs. J. H. Dorsett enjoyed the pleasure of striking the bell with the huge beam shown in the picture.).

From the temple we went on an auto or bus drive through Kasuga-Yama. En route we made three stops to botanize, collect seed and make pictures.

The exhibit below shows in a general way this large area of natural mountains and wood area, and also the relative location of the stops made.



Kasuga-yama is to the west of the city of Nara. The continuous trip can be made by auto in an hour or such a matter, and even if time cannot be allowed for stops, the trip is well worth making. The most fascinating and beautiful part of the trip (we think) is on the return from Takisak to Shin-Yakushi Temple. This portion is almost continuously interspersed with huge cryptomeria japonica trees, with huge straight trunks and their heads

Monday, May 27, (cont.)

several hundred feet above their feet which are firmly implanted in the moist soil of the mountain side; shaded by undergrowth and shrubs.

Only a short distance (several hundred yards) before reaching Takisaka, our third stop, as we rounded one of the numerous hairpin curves along the way, we saw through a vista out through the trees, one of the tall cryptomeria japonica trees pretty well covered to very near the top, with a lavender colored flowering wild wisteria in full bloom. It was a glorious sight and apparently all aboard the auto (and it was crowded) were awed at its grandeur and beauty.

After alighting from the bus at Takisaka we walked back and made several pictures of the tree and vine.

Such of the pictures made today as are worth while follow:

Negative #43732.

View from the second floor of the Nara Hotel showing in the distance a fine old Pagoda. See #43741.





Negative #43733.

View from our window in the Nara Hotel out over a portion of the city.



Negative #43734.

A deer at the side of the road at Nara, Japan.



Negative #43739.

Deer and people at the great Bell Tower at Nark,
Japan.

#43740.

Looking through and over a large
torii along a walk in the
forest in the Daibutsu
Temple grounds.



Negative #43740.



Negative #43741.

A handsome old Pagoda through the pine
trees. See picture #43732.

Hara, Japan.



Negative # 43742.

Panoramic view from the edge of the small lake in the
Daibutsu Temple grounds showing a portion of the lake and
surrounding park. Nara, Japan.



Negative #43743.

View of a portion of planted Japanese cedar along the
road through Nara Park, Nara, Japan.



Negative #43744.

This 1000 year wisteria with light lavender colored flowers has climbed within about 20 feet of the top of this large Japanese cedar. The tree is about 26' in circumference and looks to be 250 or 300 feet in height. See #43745-6-7.



Negative #43745.

A slightly different view of all that we could photograph
of this vine and tree above the tops of other trees.

See #43744-6-7.



Negative #43746.

Another view which is practically the same as #43745.

See #43744-5-7.



Negative #43747.

A close up of the base of the tree of which the top is shown in pictures #43744-5-6. The number of this tree is 427.

Monday, May 27, 1929 (cont.)

Copied from Mr. Morse's diary:

Sapporo, Japan. In the morning we went again to Dr. Ito regarding

wild plants of Hokkaido and then were given passes to the Botanic Garden. In examining the lily-of-the-valley bed, Margaret found some purple lily-of-the-valley blooms. This is said to be a German species but we had been advised that a purple flowered lily-of-the-valley occurred wild in the mountains near Hokkaido, (Hakkodate). We obtained plants of the purple flowered variety, some of the wild form occurring in the southern part of Hokkaido and the northern part of the main island, and plants of a double flowered lily-of-the-valley. We were also given plants of the wild black lily (*Pritillaria cantschatensis*) and of the dwarf iris (*Iris Siberica*, var. *Orientalis*).

While at the Botanic Garden, Dr. Ito made arrangements for us to visit a large soy sauce factory on the outskirts of the city. This factory called "The Tomoe Shoyu Factory" consists of several extensive buildings covering several acres. We were welcomed by the manager, a former student of Dr. Ito and shown through the entire plant, beginning in the large storage rooms where the wheat and soybeans are stored.

The wheat and soybeans used are entirely Hokkaido grown products, but each consists of a mixture of varieties as the factory is not able to obtain seed of any one variety of soybeans or wheat to produce their soy sauce. Samples of the wheat and beans were obtained to send to the United States. This factory manufactures soy sauce on a very extensive scale

Monday, May 27, 1929 (cont.)

and used the most modern machinery and methods. In one of the large vat rooms more than 120 vats were counted in which the wheat and bean mash is cured for about 18 months.

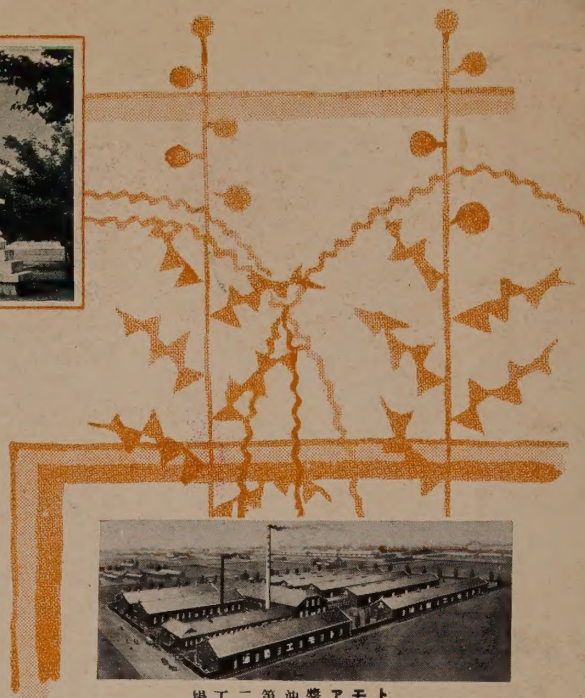
The mash from which the soy sauce was pressed out is sold as cattle and hog feeds around Sapporo. The manager was interested in the possibility of selling soy sauce in the United States.

After our visit through the factory, the manager took us to the private office and we were served first barley tea and then green tea, cakes, candy and fruit. We were presented with post cards showing a view of the factory. These are attached or will follow:



Headquarters of Tomco soy sauce factory, Sapporo, Japan.

社神幌札 社大幣官



場工二第油醬エモト

K.O.

Tomoe Soy sauce factory.

城前松山福 蹟史



Exhibit of Tomoe
Soye Sauce.



列塚の油醬エモト

K.O.



Negative #43830.
 Bush of *R. Albrechtii* in the Sapporo Botanic Garden, Sapporo, Hokkaido, Japan. This species grows wild in Hokkaido.

Negative #43830.



Negative #43831.

View showing the wild flower garden in the Sapporo Botanic Garden, Sapporo, Hokkaido, Japan. The dwarf iris, *Iris sibirica*, var. *orientalis* may be noted in the foreground and is used throughout the garden as a border plant along paths.



#43832.

Bush of *R. Albrechtii* in full bloom
 in the Sapporo Botanic Garden,
 Sapporo, Hokkaido, Japan.

Negative #43832.

Tuesday, May 28, 1929.

It was raining this morning when Mr. Kurihara and I left Nara for the Nara-ken Agricultural Experiment Station near the Electric Railway station at Goryomae, Japan. On the way we first stopped at the Bureau of Nara-ken Park. Here we met Mr. Genjiro Masuda, he is the assistant to the Director of the park, where we were collecting and making pictures Monday. We explained that we were unaware that there were restrictions on Botanizing there until so advised by one of the foresters.

We asked him about the height of the cryptomeria japonica tree #427 into which a wild wisteria has climbed almost to the top, a height we think of 200 to 300 feet, and perhaps more. He promised to find out definitely about this and also to send us seed of Prunus species, early flowering cherries, the wild wisteria and a beautiful rare white flowering tree we saw in the compound. He would like seed of Sequoia gigantea and S. sempervirens, also Black walnut, Juglans nigra, for trial here at Nara, also such publications concerning these trees as are available for distribution.

We took an electric train at Nara for Saidaiji station and there changed trains for Aburazako-cho, Nara-shi, where the Agricultural Experiment Station is located. It rained very hard practically all the way on the train, but when we reached Aburazako-cho the rain had almost ceased. We walked out to the station grounds which are only a short distance. The approach to the main station building is through cultivated area of truck and farm crops and also plantings of mulberry, pear,

peach, citrus, grapes, and persimmons.

We found that the Director was away but had the pleasure of meeting Mr. U. ^WNakagawa, the horticulturist. He is a very fine and most pleasant gentleman, and we spent several very pleasant hours with him going over the station and inspecting the crops and work.

Their peaches are headed low and pruned very much like those in our California orchards, but are planted much closer than our trees.

The fruit was all bagged to protect it from insect injury. They use pieces of ordinary newspaper, fastened closely about the base of the fruit, but the other end is open. We feel that American insects would not be fooled by such a subterfuge, but would soon find the open end of the paper fruit covering and go in and proceed to injure the fruit. See picture #43754.

The persimmon trees are headed low, about 12 inches from the ground and trained in vase form to over head trellis of wire. The limbs are tied to bamboo canes, which are in turn tied out to the trellis wire and thus held in position. They are trying out about 36 varieties of persimmons here at this station. Puyu is considered the best non-astringent variety. The stock generally used in this region is any kind of kaki seedlings, but thinks that the seedlings of Michikori a semi-wild kaki perhaps makes the best stocks. He thinks that these seedlings are quite resistant to crown-gall.

Mr. Nakagawa told us that within a radius of 2 miles square in that region there are more than 10,000 kaki trees growing and that the most of these are non-astringent. In his opinion,

Tuesday, May 28, 1929 (cont. 2)

the Hyakume variety is best in that region, and throughout Japan for the purpose of drying. He told us that Fukuba, a wild strawberry, is to be found in that region and that he will try to send us plants a little later.

Mr. Nakagawa also told us that this is an extensive watermelon growing region, and requested that we get for him a small quantity of the seed of two or three of our best American varieties, and we promised to do so.

From the Agricultural Experiment station we went to the Tomb of the first Emperor Jimmu, but were not allowed to make pictures at the tomb, which is one of the simplest tombs we have seen. On the edge of the lake is a rough stone lantern, different from any we have yet seen, we got a very good picture of it which is very attractive.

such of the pictures as were made today as are worth while follow.

Negative #43748.

View at the Nara-ken Agricultural Experiment station showing cucumber interplanted with barley.





Negative #43749.

View between rows of experimental onions grown for seed.
The light area between the rows is water.



Negative #43750.

The Station buildings at the Nara-ken Experimental
Station.



Negative #43751.

Tree supposed to be about 7 years old. Note the low heading and open head pruning.



Negative #43752.

Looking along one side of a pear orchard trellis.

The pears (fruit) is bagged.



#43753.

An old persimmon stump worked over and grafts protected with soil, is held in place by paper about the union.

Negative #43753.



Negative #43754.

Peaches bagged with open-end newspaper bags to protect the fruit from insect injury. The insect, it is said, will not trouble fruit bagged in this way.



Negative #43755.

Pollarding silk-worms, mulberries.



Negative #43756.

View over a portion of a planted area at the Station
showing how water stands between the rows.



Negative #43757.

The back hedge is a bright red leaved plant, the front one a quercus both are handsome.

Negative #43758.

A beautiful rough stone lantern on the edge of a lake at the Emperor Jimmu's tomb at Nara, Japan.



Negative #43758.



Negative # 43759.

Panoramic view from a 2nd story window of the Nara Hotel,
showing a good portion of a small lake near the hotel.
Nara, Japan.

Copied from Mr. Morse's diary.

Sapporo, Japan. We went to the Sapporo Farmers' market about 5:30 a. m. as the market opens at 4 a. m. and everything is cleaned up by 7:00 a. m. It is located on the outskirts of the city and is not very large.

The following crops and plants were noted:

Flowers: tulips, narcissus, wild flowers of several kinds, flowering plants, cultivated and wild. Evergreens in pots.

Bamboo shoots, smaller and of a different species than found in the Tokyo market.

Ginger roots: lighter and larger, and a different variety than found in Tokyo.

Potatoes: white and of two varieties.

Water chestnut.

Lily bulbs: edible and of two kinds.

Lotus root.

Yams.

Celery, forced.

Onions, green and mature.

Radishes, much smaller than found in Tokyo.

Greens: many kinds.

Butter bar.

Lily bulbs, ginger roots, bamboo shoots, and plants of *Aquilegia* (*aquilegia skitensis*) were purchased.

After breakfast we made the rounds of seed stores and small grocery stores, and succeeded in obtaining several varieties of soybeans, garden beans, and some flower seed. At the Aizura Seed Company we found they handle many varieties of lilies,

Tuesday, May 28, 1929. (cont 3).

some of which we did not see at other stores.

We visited Sapporo's large department store seeking good products. Tokyo's large stores to us seem to have about everything under the sun, but the Sapporo store has everything. We found some new soybean products, and quite a variety of other bean products. This store had a very unique roof garden from which excellent views of Sapporo can be obtained. In addition to a Japanese rock garden there was an animal store, green house, children's playground, flower shop, bird department, and singing insects in very attractive cages. One of the departments of the store had a varied assortment of wood products carved by the Ainu, the Aborigines of Hokkaido.



Negative #43833.

A view taken at the farmers' market, Sapporo, Japan.

This market opens about 4 a. m. and by 7 a. m. is closed.



#43849.

View showing farmers' market. These products consist mostly of onions, and radishes. Sapporo, Japan.

Negative #43849.



Negative #43841.

View showing woman farmer selling by wright some of her products in the Farmers' Market, Sapporo, Hokkaido, Japan.



Negative #43842.

View showing woman farmer selling wild flowering plants, trees, and shrubs in Farmers' Market, Sapporo, Japan. Our interpreter, Mr. Suyetake, looking at some Aquilegia plants which we purchased.

Wednesday, May 29, 1929.

Left Nara at 8:08 a. m. en route for Ogaki where we expect to spend the night.

The following notes and observations were made en route and in a way will serve to give some idea of the country we passed through and the crops of this region. The observation for the most part were recorded on the train while en route.

Kizu Station 8:20, mulberry, wheat, bamboo, rice paddies, and rice seed beds, truck crops, broad beans, and on the hill slopes azaleas (wild). wild roses (small white flowers), and kaki persimmons.

We stopped off at Kano to visit an extensive persimmon growing region back in the country about two and a half miles.

At the village of Kano-machi, we saw at the Kano-machi grammar school, a very good white iris, straw yarie (?) which we hope we succeeded in getting a picture of (See picture #43760). We also saw a fine specimen of ^{hollyhock} ~~lilac~~, with rather small reddish-purple flowers about 1 1/2 inches across known locally as zenl. We met here a Mr. who was very pleasant and after learning about our business kindly offered to send us seed of the hollyhock and roots of the iris. Later when we were at the Office of the Cooperative Village Association at Kyoto-fu, Soraku-zun, Tonosaura he phoned that he had a plant of the hollyhock for us if we would stop by his office on our return, which we did and are now carrying this plant with us. When we get back to headquarters at the Sankaido Building, we will, if we think it advisable, send the roots of this plant on to Washington.

Here at the village we also met a Mr. Oura carrying two large baskets of mulberry leaves. He was going our way so we got pretty well acquainted and before he reached his destination or we ours, we had arranged for him to secure for us if possible the following: 100 wild lily bulbs, an ounce or so of seed of lily; 3 pounds of wild kaki seed; 5 pounds of wild wisteria seed; a sake cup each of the dark and light pink flowered azalea; $\frac{1}{2}$ pound of wild cherry seed; $\frac{1}{2}$ pound of wild pear seed.

Mr. Oura told us of a small wild pear, known as "Eyonashi" (rock pear) which he said is very sweet and good, and is ripe about this time of the year. He will try to get us some seed of this also.

On the way up to the office of the head of the village, we stopped to measure a very large, and we should say old, persimmon tree, at about 18 inches from the ground it measured 127 inches in circumference or 10 feet 7" and was, we guess, not less than 50 to 60 feet in height. Mr. Oura said it is more than 200 years old. See picture #43767. The oldest trees in this region are said to be 350 to 360 years old. From the looks and size of some of the trees we saw in this section, we can readily believe they are all that old if not much older. They are larger and taller trees than the ones we saw in the Ming Tombs region in China, which we were told are 400 or more years old.

We met at the headquarters of the head of the village Mr. Uyedo Hiroshi, Assistant to the Village Master of Kano-machi, Kyoto-fu. One of the old persimmon trees measured just before reaching the town office of the Village measured 127 inches in

Wednesday, May 29, 1929. (cont 2.)

circumference and is fully 50 feet in height (See picture #43767). One measured later was 85" in circumference and ~~xxxx~~ another old tree of the Tioke variety measured 126" in circumference.

The area in this region devoted to the culture of persimmons is reported to be 50 cho, or a little less than five miles square, and in this area is growing 4980 trees. The yearly weight of the fruit from these trees is 246,700 kon (a kon is equivalent to about 8½ pounds). The yearly crop of fruit therefore is 2,096,950 pounds of fresh fruit, having a total value of Y123,600.

The output of dried persimmons for the region is 158 kon or 1343 pounds, valued at Y124.00. The total valuation of the fresh and the dried persimmons is Yen 123,724. We were advised that the yearly expense for fertilizer per kaki tree is Yen 3.60. Oil cake and about 10 bales of green manure are used for each tree a year.

The total value of fertilizer for the section if given at Y2,290.

Harvest begins about October 10th and is about completed by November 10th. These dates are for the average crop. For early and late varieties these dates vary somewhat.

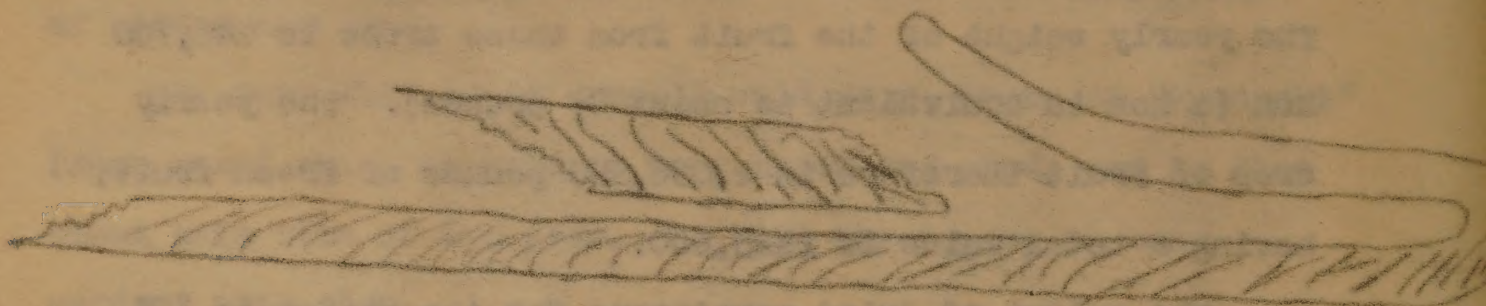
The varieties most generally planted were given as Kinori, and Kubo, early, and Teoka late. Fully 90% of the plantings are of these varieties.

The trees are pruned every other year, and do not bear crops the season following the pruning, which is done in February and March. The village organization is such that

the trees are crop ped in sections. For example; the section we visited was off crop this year, but the trees on the other side of the valley are bearing a good crop. It would appear that American farmers and fruit growers might well afford to send someone over here to study the Japanese farmers and fruit growers associations especially in this and similar sections.

Pruning is effected with an iron hook on a pole.

Actual size drawing:



The branches to be removed are broken off with this tool. In talking with the men at the village office about pruning, they advised that the present method of pruning has been practiced for about 300 years. Mr. Uyeda also said that they had tried numerous methods of pruning, including the knife and shear, but that no method has proven so satisfactorily as the present one which is in universal use throughout the region.

He claims that when the branches and twigs are cut off, many more buds sprout from near the wound, which is undesirable and does not occur to such an extent when the limbs and twigs are broken. From their experience they consider the practice of breaking with a hook the best one for this region.

We were advised that this village once offered persimmons to the Emperor. The village has a song to the persimmon, which Mr. Uyeda promised to have copied and mailed to us.

They harvest in this section with a split bamboo pole.

Wednesday, May 29, 1929 (cont. 3).

The practice is the same as that used in some sections about Peking.

In fertilizing persimmon trees, parallel trenches are dug on each of two sides of a tree, about 4 feet from the trunk and 4 feet apart, out to the spread of the branches. Into these bean cake fertilizer is put in November to February, and covered with earth. In the summer, June to September first, trenches are again made and green manure, of rather harsh material like sasla bamboo, (the low growing bamboo found quite generally over a wide area of Japan) is used. It rots slower and on this account is considered more desirable for the persimmons than quicker rotting material. See picture #43772.

We left Kamo Station at 2:30 p. m. and about 8 P. m. arrived at Ogaki where we remained during the night.

The region between Kamo and Ogaki, the country and crops were found to be pretty much the same as in other sections that we have been traveling in.

Wheat, barley, broad beans, buckwheat, ringe (Japanese red clover) rice seed beds, bamboo plantings, and mulberries were the principal field crops. In the mountain and rolling districts there were pines and other native trees, also azaleas and many other shrubs, not known to us.

Such of the pictures made today as were worth while follow:



Negative #43760.

A row of white iris along a ditch near the Kano-machi Grammar School.



Negative #43761.

A characteristic Japanese farm house in this and other districts of Japan.



Negative # 43762.
43762.

An interesting conversation. Left to right: Mr. Oura, a Japanese farmer with a bamboo basket filled with mulberry leaves, Mr. Kurihara, Mrs. J. H. Dorsett. This man is to get us seed of a number of things.

#43763.

A good sized persimmon tree in the yard of a Japanese farmers.



Negative #43763.



Negative #43764.

Wild azaleas on the hillside, near Kumo-machi, Japan, and they were very attractive.



Negative #43765.

A wild rose with many clusters of small white flowers. It grows in abundance here on the hillside. Kumo-machi, Japan.



#43766.

Orchard plantings of
persimmon, near Kamo-
machi, Kyoto-fu, Japan.

Negative #43766.

#43767.

A nearby view of a persimmon
tree 127" in circumference,
or 22 feet. It is said to
be 200 years old. Japanese
horse radish is growing under
the tree.



Negative #43767.



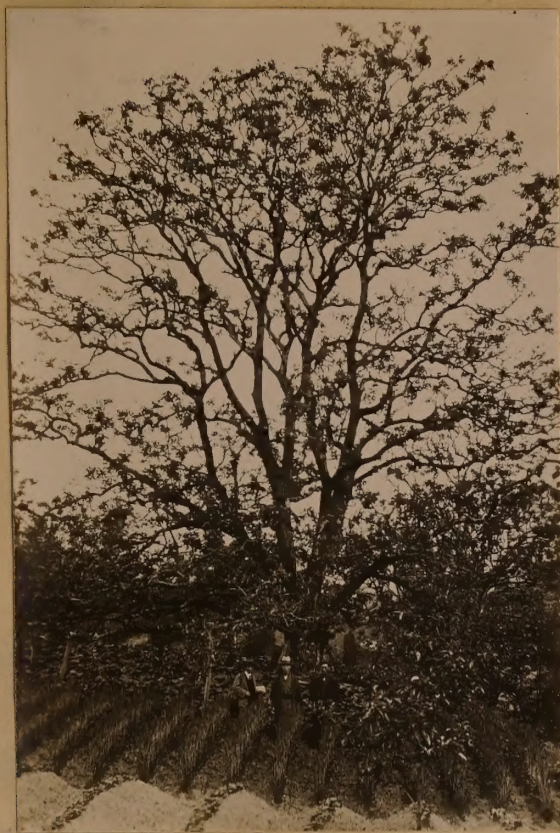
Negative #43768.

Mr. M. Kinomoto and his friend under one of the oldest persimmon trees in this region. It measures 88 inches in circumference.



Negative #43769.

The same as #43768 except a slightly different view and change of the position of the men.



Negative #43770.

#43770.

This tree measures 126"
in circumference and is
said to be 200 or 300 years
old.

#43771.

Young plants of Japanese
horseradish. Kano-machi,
Kyoto-fu, Japan.



Negative #43771.



Negative #43772.

showing part of 2 furrows under a persimmon tree into which green manure is filled to fertilize the trees.



Negative #43773.

A fairly nearby view of a persimmon branch pruned this winter. It will crop next year.



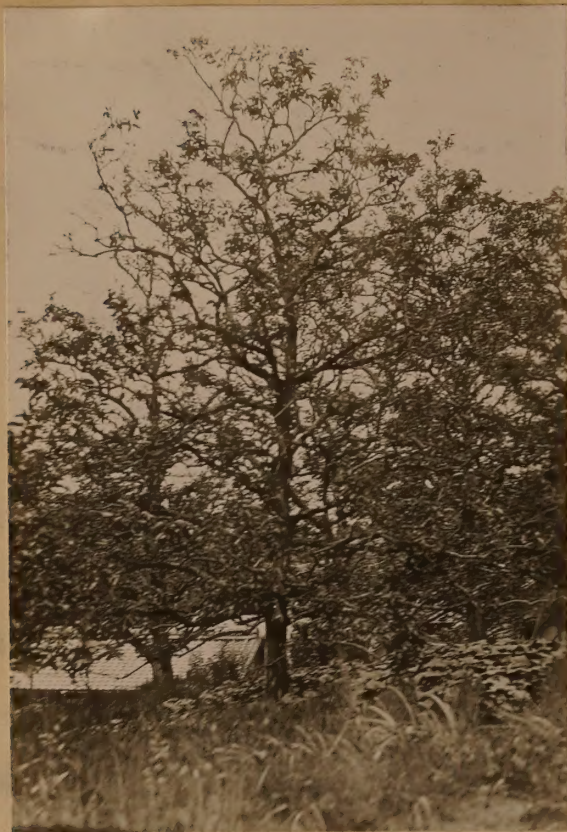
Negative #43776
43776.

A distant view of the trees and party shown in picture #43775.



Negative #43777.

At the entrance to the house of Mr. the
gentleman who first brought the Tloko persimmon to this
region.



#43774.

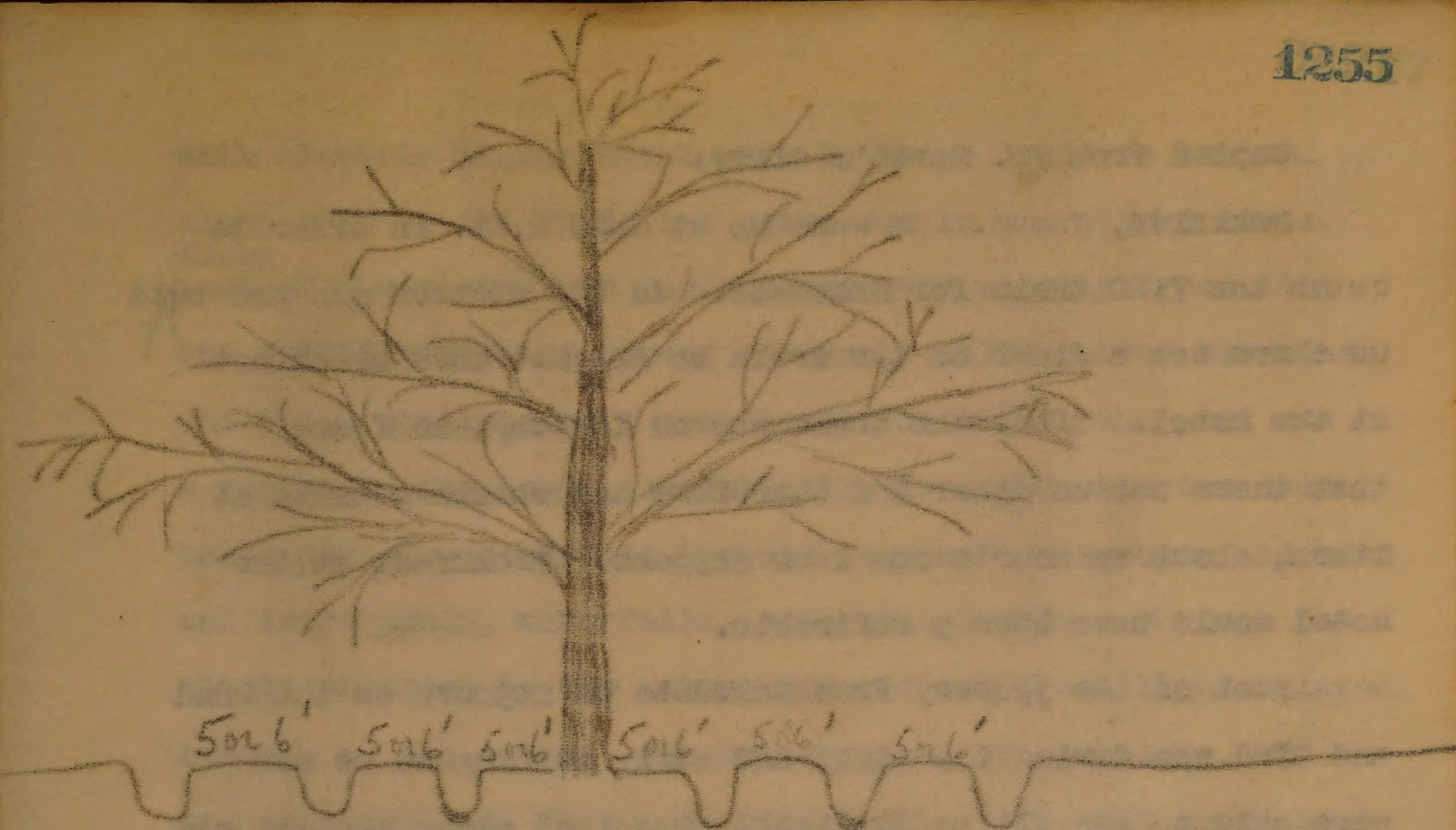
Trees pruned this
past winter. Hamo-
machi, Kyoto-fu,
Japan.

Negative #43774.



Negative #43775.

Mr. Kurihara, Mrs. J. H. Dorsett, Unknown, and Mr. Kinomoto
standing between two of the first trees of persimmon, Teoko
variety, to be planted in this region. see #43776.



Persimmon tree with trenches dug 5 or 6 feet from the opposite sides of the tree and then 5 or 6 feet apart parallel to those nearest the tree. This practice is continued out as far as the spread of the branches. In these trenches is place in the spring, January and February, the bean cake fertilizer, and then covered with soil. In June, July and August similar trenches are made and filled with green manure, sassh bamboo leaves and small stems is what is most generally used.

Copied from Mr. Morse's diary:

Hokkaido, Japan. We were up at 6:00 a. m. in order to catch the 7:20 train for Hakodate. As the station man had told us there was a diner on the train we did not have breakfast at the hotel. After the train was on its way, we found that there was no diner and therefore had obtain a bento at Otaru, about an hour's run from Sapporo. Breakfast at the hotel would have been preferable.

Most of the journey from Hakodate to Sapporo on the 22nd and 23rd was during the night and early morning so we now were able to see all by daylight. The land along the way was quite mountainous but the hills and valleys were extensively cultivated. Rice is produced in abundance, wild mountain cherries were in full bloom on the hill and mountain sides. Many wild flowers were noted in the valleys while the mountain tops and sides were covered with snow. Hokkaido seems to be an excellent place for botanizing.

We arrived at Hakodate at 4:45 p. m. and went at once to the Katsuta Hotel which is across from the station. Although the hotel had one foreign room we took a Japanese room, but would not recommend the hotel as the meals and accommodations were much inferior to those at the Yamagataya, Sapporo. Terry in his guide recommends the Kito and Kakuchō hotels.

After supper we went by street car to Hakodate Park where cherry blossom time was being celebrated. This park contained more and larger cherry trees and more varieties of blossoms than any we have yet seen. The park is situated in the foothills mountains and the contour reminds one much of Rock Creek Washington, D. C. It was beautifully illuminated with

with electric lights which were in large Japanese lantern.

along some of the roads and paths and in the cherry trees.

Along

Most of the paths and roads there were so many trees that one walked beneath a canopy of nearly solid cherry blossoms.

One could not imagine a more beautiful sight, the park was a veritable fairyland. Artistically arranged with the cherry trees were the carefully trained Japanese evergreens and here and there ponds, waterfalls, and rock gardens. Through the cherry blossoms by the water side red and green lights played through on the water. Our interpreter, Mr. Sugitake, who has seen the most famous cherry blossom festivals throughout Japan, said he had never seen a more beautiful sight. During our wanderings in this beauty spot, our thoughts were with Mr. Dorsett, and the Eyemo camera, for many hundreds of feet of colored film could have been taken that would have proved a sensation to our Washington friends. But Dorsett and the Eyemo were several hundred miles away and we were in a fortified zone where no pictures could be taken. It was well perhaps that they were not present for we know that the array of beauty before us (and the many sake stands about us) that Dorsett would have tried to take some pictures and had us all in the hands of the military police. If arrangements could be made with the military authorities, it would be well worth a trip from Tokyo or Manchuria to obtain a series of colored motion pictures of Hakodate Park at cherry blossom time. We were able to secure colored post cards showing some of the park views of cherry blossoms.



觀 櫻 會 (五 稜 廓) (津輕要塞司令部御許可)

Picnic party at Goryokaku Battlefield about 2 miles northwest of Hakodate, Hokkaido, Japan. May 30, 1929.



櫻 花 の 下 (五 稜 廓) (津輕要塞司令部御許可)

Cherries along the roadside at Goryokaku, about two miles northwest of Hakodate, Hokkaido, Japan. May 30, 1929.



五稜廓の賑ひ

(津輕要塞司令部御許可)

Part of battle ground surrounded by flowering cherries,
Goryokaku, about two miles Northwest of Hakodate, Japan.
May 30, 1929.



花 見 客

(五 稜 廓)

(津輕要塞司令部御許可)

People going to the Goryokaku battlefield to view cherry
blossoms. Hakodate, Hokkaido, Japan.



花のトンネル

(函館公園)

(津輕要塞司令部御許可)

Cherry tree lane in Hakodate Park at cherry blossom
time. Hakodate, Hokkaido, Japan. May 30, 1929.



白川橋の八重ざくら (函館公園) (軍艦要塞司令部御許可)

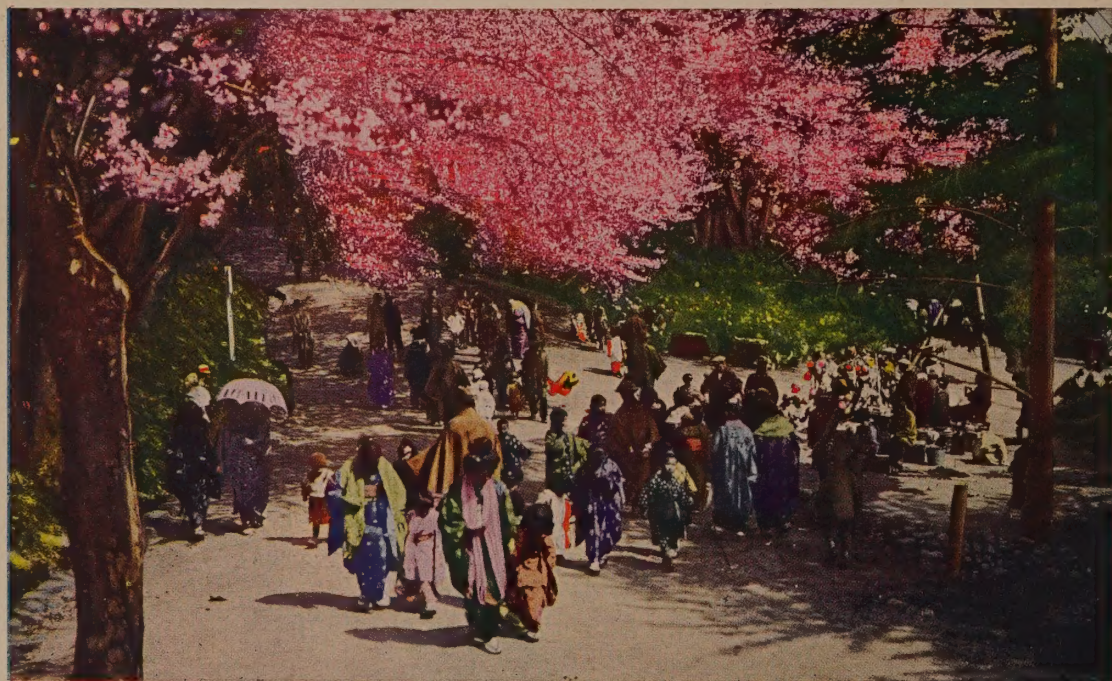
double flowering cherry trees near Shirakawa Bridge,
Hakodate Park, Hokkaido, Japan.



櫻花爛漫

(函館公園) (津輕要塞司令部御許可)

Cherry trees in full bloom at Hakodate Park, Hakodate,
Hokkaido, Japan. May 30, 1929.



花見歸り

(函館公園) (津輕要塞司令部御許可)

Cherry blossom time at Hakodate Park, Hokkaido, Japan.

Thursday, May 30, 1929.

Left Ogaki at 11:15 today and arrived at Gifu about noon today and went to the Tamaiya Inn, which is considered the best in the city. We had tea and then went over to the Gifu-ken Agricultural Experiment Station.

We met Mr. S. Ishiwara, the Horticulturist of the station and spent a very pleasant evening with him. We also met just for a few minutes the Director of the station, Mr. H. Jokoyama, and Mr. S. Usui, Horticulturist in charge of Vegetable Investigations.

On our way from Ogaki to Gifu, just before arriving at and crossing the Ebi River, we saw some beautiful farming land and excellent crops, especially the Japanese red clover known as "ringe".

In our conversation at the Experiment station we happened to mention that fact and learned that this is one of the best places in Japan for this crop, and that they have here an early, midseason, and late variety of this cover crop.

We were thanked for the seed and scions of *Diospyros virginiana*, which were received from us after our arrival in Tokyo in March.

We were pleased to note that the seedlings of *Diospyros* are coming up and that they had succeeded in saving the following from the scions sent to him after our arrival here in March:

9 Josephine

1 Lone Star

5 Ford

5 Leona

Mr. Ishiwarashowed us these results with apparently much pride and pleasure and we congratulated him upon his

We saw a nice young orchard of persimmons, containing about 25 varieties. Only a few of these will bear this season, however, he told us that his collection was practically a duplication of the collection at Okitsu and that, this fall we could see fruit there.

We saw considerable green manure crop work. Vetch, Japanese clover, crotalaria, etc., also considerable grain work.

He told us that this region is the principal one for Fuyu persimmons and promised to show us the original tree tomorrow, which, however, he said is in bad condition on account of it's having to be moved on account of building construction.

Mr. Ishiwara also promised to show us some of the good sections of green manure growing, where we hope to be able to secure pictures.

In the office, Mr. Ishiwara showed us a map of the important areas for the principal fruits of this Prefecture. It was unique, in that colored drawings of the fruits were made directly upon the map. Persimmon, cherry, chestnut, pear, grapes, etc., were on the map.

He is very much interested in the storage of persimmons. He has tried storing in ordinary box, but this practice did not prove very satisfactory. His best results were obtained with storing Fuyu in excelsior, covering with rice straw and placing in a cold godown at a temperature of 2 centigrade. He stated that Hatchia is the best variety for drying, not only in this region, but throughout Japan. Pictures follow:



Negative #43778.

Dogs assisting to pull carts. This is the first place where we have seen dogs used to assist in pulling carts and other conveyances. Ogaki, Japan.

Negative #43779.

View of Ogaki Castle through the pines. A somewhat peculiar, but fascinating building.



Negative #43779.



Negative #43780.

On the left a large shallow bamboo basket for use in feeding and handling silk worms, at the right a grass mat covering which is placed on top of the bamboo basket.



Negative #43781.

A fairly nearby view of mulberry plants, pollarded fairly high, sometimes they are higher, sometimes lower. The silkworm leavings and droppings are returned to the land.



Negative #43782.

Another view of pollarded plants. Gifu-ken Experimental Station, Gifu, Japan.



Negative #43783.

Looking across a field of ringo or gengi, Japanese red clover. It has been cut and is wilting and browning preparatory to being plowed under for green manure.



Negative #43784.

View showing a good plot of this Japanese clover in full bloom. It makes a very attractive showing.

Gifu, Japan.

Thursday, May 30, 1929 (cont. 2).

Copied from Mr. Morse's diary.

Hakodate, Japan. Decoration day in the U. S., so we observed the day by going out again to Hakodate Park to see the cherry blossoms by day. Although very beautiful in the sun light, we did not enjoy them as at night under illumination. Even though the sake stands were open, we had the opportunity however, of noting the many varieties of cherries. There were the pink and white singles of different sizes, and the various shades of pink double and the white double, which varied in size of flower. The single varieties were beginning to lose their petals and occasionally when a strong gust of wind came, the petals fell so thickly that it reminded one of a snow storm. Before we left the park, the ground about the single flower trees appeared as though a recent snow storm had passed. With the petal strewn ground and the thickly falling petals we were presented with the last beautiful act of the Cherry Blossom time.

We had planned to visit the foothills of the mountains about Hakodate to see the wild lily-of-the-valley, and seek the purple flowered form. On our way to the city suburbs we stopped at several seedsmen and grocery stores, and purchased several varieties of soybeans, peas, and beans, and also some bulbs of an edible wild lily which we had not seen before.

After we reached the end of the suburban car line, we walked about two miles into the foot-hills where we found the wild lily-of-the-valley growing in abundance. The plants were just coming into flower, and when in full bloom, the

hillsides must present a beautiful sight for the plants were as thick as weeds. We obtained plant specimens but in our searching over a considerable area we did not see any purple flowered plants. Violets were growing in abundance and we secured several species and sub-species for herbarium specimens. When we returned to the suburban station we found a large crowd of wild flower gatherers with large quantities of lily-of-the-valley.

We took a walk after supper about the business streets to see if we could find any new food products. At a store where they sold pickles we saw a tub of pickled soybean pods, the seeds of which were about full grown. These pods were pickled in the same manner as we pickle cucumbers and sauer kraut, that is by salting down. This is the first time we have ever heard of or seen this kind of soybean product. According to Mr. Suyetake, this form of soybean product is eaten along with refreshments, the kind we no longer have at home. It seems rather ironical that we should come to study soybean products for the United States and find so many that, to enjoy them most, they should be eaten along with refreshments of the pre-prohibition era of our country, But such is fate!



Lily-of-the-valley growing wild near Hakodate,
Hokkaido, Japan.

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Friday, May 31, 1929.

This morning we drove out to the Gifu-ken Agricultural Experimental Station and picked up Mr. S. Ishiwara and Mr. S. Usui and were later joined by the agent of the Motosu-gan Agricultural Association of Gifu-ken. We then went first through sections of wheat, which is almost ripe and will be replaced shortly with rice. There were beautiful patches of Japanese clover, known locally as "Genge" but popularly known as "Renge", and other farm crops too.

Mr. Kakichi Ukai, who owns the original tree of Tenjin Gesho, one of the principal non-astringent varieties of Japan. We made a picture of this tree. It looks to be a seedling but no one knows now from whence it came. The tree is 35 $\frac{1}{2}$ " in circumference about 2 feet from the base and is reported to be 150 or more years of age. It's owner, Mr. Ukai estimates the tree to be of that age or even older. It bears good regular crops of fruit. We have the permission of the owner to get scions from this tree this fall. Below the branches the tree measured 48" in circumference, trunk on left 25" on right 27" in circumference.

From here we drove several miles through fields of golden grain, scarlet green manure of clover, seed beds of rice distributed through the fields, the seed beds which are destined in the very near future to replace practically all other crops of the region, to the home of Mr. Hatsuya Ogura to get a picture of the original tree of Fuyu. We learned yesterday that some little time ago this tree was moved to make room for a building, and that it was in very poor condition.

When we arrived we found only about an eight foot stump of two trunks remaining. About a week ago the owner cut away the top to try and force the trunks to throw vigorous shoots lower down or from the roots. Thus far there is no indication to show that this will be the result.

On account of the historic interest and possible value it may be, we made a picture of the stump. The two main trunks from within about 1 foot of the ground were photographed with the following men standing near: Mr. T. Ito, Mr. Hatsuho Ogura (owner of the tree), Mr. Kurihara, Mr. S. Usui and Mr. S. Ishikawa. This picture will follow later.

From here we drove back through fields of ripening wheat, range in full bloom, and other farm crops and stopped on several occasions to make colored motion and panoramic pictures of interesting farming areas and range scenes.

We called while out, upon Mr. Ito, who gave us a specimen of range which measures 64" in length exclusive of roots. This plant is a rank grower, a good forage, and the principal and best green manure crop of this region. The best variety is said to be wesekomugi.

We left Gifu at 4:03 and arrived at Nagoya at 4:58 p. m. The country in between these two cities is part of a broad valley. From the train we noted the following crops and products and found these pretty constant throughout this district: wheat, mulberry, broad beans, potatoes, mustard, Japanese clover, and at villages an occasional kaki tree. Practically all the farm crops a little later will give way to rice, the principal crop of Japan.



#43785.

Stump of the original tree of Fuyu persimmon which died only a short time ago. The tree was moved to make room for a building and died as the outcome. see #43792 for more details.

Negative #43785.



Negative #43786.

An old Japanese fisherman from whom we secured a small trap net which he originated. It's hoops and stakes are of bamboo. Mr. Kurihara is at the left talking to the old gentleman.

Negative #43787.

Practically the same as #43786, but taken in a different position.





Negative #43788.

Original tree of Tenjin Goshō persimmon at the home of Mr. Kakichi Ukai. It is said to be 150 years old, at about 3' above the ground the tree measured about $45\frac{1}{2}$ " in circumference. see #43789 and 90. It bears regularly good crops. The tree has every evidence of being a seedling.



Negative #43789.

The original tree of Tenjin Gosho, standing just at the corner
of the house. There is a clump of in front
of it. see picture #43788-90.



Negative #43790.

Left to right; Mr. S. Usui; Mr. Y. Kurihara; Mr. Kakichi Ukai, owner of the tree; Mr. S. Ishiwara.

The Tenjin Goshō is just behind Mr. Ukai, the owner of the place.



Negative #43791.

A village road and on either side bamboo groves, an attractive scene and view.



Negative #43792.

Left to right: Mr. T. Ito (?); Mr. Hatsuho Ogura;
Mr. Y. Kurihara; Mr. S. Ishiwara and Mr. S. Usui.

The stump between these gentlemen is all that is left of the
original tree of Fuyu. The tree was moved a year or so ago
to make room for a house and this is the result.

Right trunk measures 25" in cir., left trunk 27" in
circumference, and below the fork the tree measured 48" in cir.



Negative # 43793.

Panoramic view in farming area showing rice seed beds,
in the foreground and wheat, barley and other crops in the
background.

3821



Negative # 43794.

Showing rice seed beds in the foreground and other
farm crops in the background.



Negative # 43795.

Panoramic view of the general farming area near
Sifu, Japan.



negative # 43796.

Panoramic view in farming area showing paddy plot ready to plant and on the sides Japanese clover, green manure.

Copied from Mr. Morse's diary:

En route. We arose about 6:00 a. m. and this time took no chances with breakfast and had our breakfast at the hotel. After we were each presented with a towel and a handkerchief by the hotel management we went to the ferry station, about a five minutes' walk from the hotel, and took the ferry boat which left at 8:00 a. m. for Aomori, the northern point of the main island. We arrived at Aomori at noon where we had lunch in the station dining room. We left on the 1:48 p. m. express for Tokyo.

The Aomori prefecture is said to be the largest apple producing region of Japan. Along the railroad embankments the wild lily-of-the-valley was growing in profusion. Near Sannoi many persimmon orchards were noted and about the houses persimmon trees of considerable size.

Saturday, June 1, 1929.

We had breakfast in our room at 7:00 this morning because Breakfast was not served in the dining room until 8:00, and about 7:55 left the Yaugibashi Station, Nagoya on an electric train to visit the wholesale market. It sprinkled in the early morning and off and on throughout the day, and the sky was overcast, but it was fortunate for us that it did not rain. At the market we noted the following fruits and vegetables:

Fruits.

strawberries, large & fine.
Name of large ones "shishi"

see picture #43799.

Oranges.

Apples.

Loquat, very nice ones.

Ume (plums for pickling).

Watermelons.

Mogi, very good. (?)

Bananas.

Cherries.

Pears.

Vegetables.

Onions, fresh and bulb.

Peas, for hullins & edible pods.

Beans, string, in small pkgs.

Beans, broadbeans.

Turnips.

Daikons, long white radishes.

Ginger, roots & forced shoots.

Bamboo shoots.

Mizuna.

Perilla for seasoning.

Potatoes, white.

Carrots.

Lettuce in variety.

Fuki.

Gobo, burdock.

Cabbage.

Beets.

Egg plant, in variety.

Akaza, Lamb's quarters, for greens.

Tomatoes.

Kikuna, edible chrysanthemum for greens.

Squash.

Cucumbers.

Gourds.

Matsuna.

Spinach, Japanese.

Tado, used in decorating raw fish.

Myoga.

Mitsuba, Japanese celery.

Lotus roots.

Tsuruna, boiled as greens.

Dasheens.

Sausho.

vegetables seen in the Nagoya fruit and vegetable market,
continued:

Onions, Rakko, for pickling.
Sioscorea, long round roots.
Garlic, bulbs.
Horseradish, Wasaba.
Udo.
Mushrooms.
Radishes, root and sprouts.
Asparagus, very good.

After finishing our observations at the market, we walked over to Biwajima Station and got the 9:35 train for the Experimental Station near Anjo.

The following recorded observations were made en route to and from the Agricultural station, we returned by an electric car.

About Atsuta, Japan, appears wetter and poorer land than that ordinarily seen, would say that rice and wheat are the principal crops of this region. About Odaka, at 10:10 a. m. and leaving this station for a little distance the land is more or less rolling, principal crops observed: wheat, rice and mulberries.

Obu, at 10:20, still in a rolling country, citrus, bamboo, rice, are main crops. Kariya is in or on the edge of a rather broad level valley, wheat, and rice are mostly grown. Here we saw a few plantings of pears, and a little farther on and shortly before reaching Aqua, we saw quite a number of plantings of pears.

We got to about 11:30 and here had a little lunch before walking out to the Agricultural Experiment station. We visited an Agricultural school just before getting to the station and enjoyed seeing the school children at work in the school garden.

Saturday, June 1, 1929 (cont.) 2.

We made a few pictures here which we trust will prove to be good.

At the Agricultural Experiment Station we met Mr. Misao Uyeno, Director of the station; Mr. Kikuji Kuwazuka, Pathologist and Entomologist; Mr. Daikichi Shiraishi, the Agronomist in charge of wheat and rice growing and breeding, and Mr. Kuwazuka the Horticulturist in charge of the pear and other fruit work of the station.

In response to inquiries we learned that they are experimenting with something like 250 varieties of wheat, and are testing out over 100 hand pollinated types of this cereal. They have 20 important varieties of commercial soft wheat and are also testing out quite a number of hard wheats, and breeding to try and secure hard varieties which will succeed on their moist soils. They are also trying out about 80 varieties of barley.

Mr. Shiraishi, the barley specialist of the station is anxious to get if possible, for trial, seed of what he calls soft awn barley. He tells us that frequently the awns of the barley, as they are growing, cut the hands of the farmers.

Hard awned barley.

Soft awned barley.

We also met Mr. Kuwazuka, the pathologist, and pear specialist of the station. He told us that their best commercial pear is Negisseeck and the second best is choyonso.

He says that with Chojuro they are troubled sometimes with Black spot, altemaria; also with a species of phoma. They also have what they call stem blight and circular spot of the fruit.

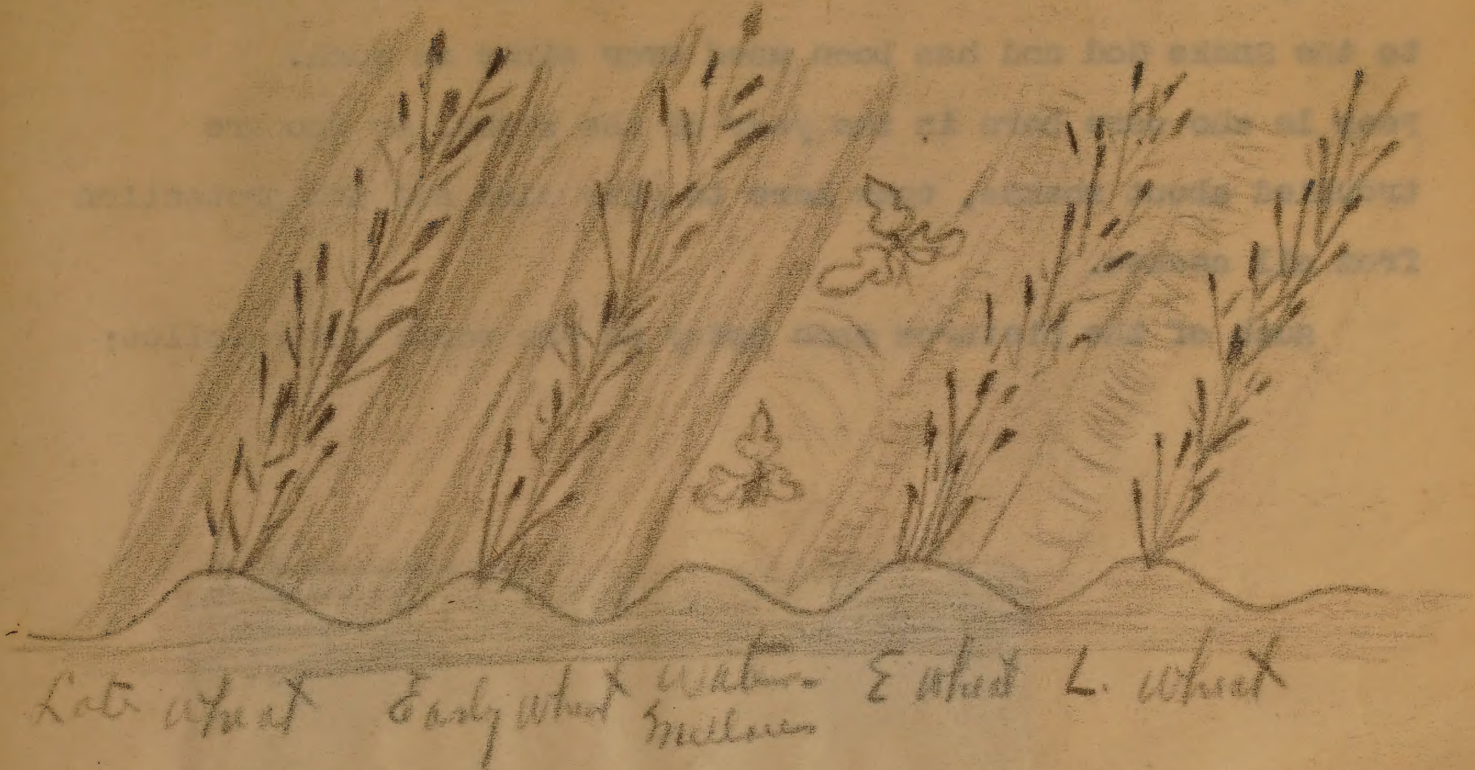
For the plant material in which they are especially interested and which we have requested (see our letter to the Director, under date of June 12, 1929).

This is a watermelon growing districe. The sectional method practiced in growing this crop interested us immensely.

A row between four rows of wheat, one early and one late ripening variety oneach side of the central row, is first planted to an early ripening crop of some kind. After this is removed, the land in this central row is set to watermelon plants. The watermelon plants were in their second and third leaf when we visited the station and the wheat in the row on each side of the melons was beginning to color, while that in the next row on either side was quite green.

By the time the melons need the space, the first row of wheat on each side will be ready to harvest, and a little later the other two rows. These rows of wheat protect the melons from cold wind which is said to be very beneficial, a field planted in this way looks something like the following:

Saturday, June 1, 1929 (cont. 3).



Also see picture #'s 43309-10, which show this method of watermelon interplanting of wheat. Cucumbers are also sometimes cultivated in this way.

When we returned from the Agricultural Experiment Station, in the afternoon, we stopped to see the ground and Shrine Atsuta also known as "Miya". There is here a good set of Shinto shrines and the grounds are quite attractive.

We found here the largest and most handsome camphor trees we have ever seen. One measured about 25 feet 6 inches in circumference and another a little over 22 feet in circumference.

We saw here a large dead camphor tree used as a shrine. We were told that people were praying there and giving their offering to the "God of snakes."

Tradition has it that during the Russian-Japanese war, a large snake lived in this tree, and that when it died,

(It crawled to the top of the tree and went to Heaven in that manner) the tree died also. The tree was then made a shrine to the Snake God and has been used ever since as such. People who were born in the year of the snake, or who are troubled about snakes, come here to give alms and ask protection from all snakes.

such of the pictures made today as are worth while follow:



Negative #43797 a.

View in the market at Nagoya, Japan, showing a few of the vegetables before one market man's stand.



Negative #43798.

View of strawberries at one dealer's stand in the market at Nagoya. The berries were of good color and large size. See #43799.



Negative #43799.

A close-up picture of one of the boxes of strawberries shown in picture #43798. This picture shows something of the size of the fruit. Nagoya market, Nagoya, Japan.



Negative #43800.

A nearby view of straw-wrapped and one unwrapped watermelon, just as they appeared in the market. Nagoya, Japan.



Negative #43801.

View over a collection of vegetables in front of several market stands. Nagoya, Japan.



Negative #43802.

Taken to show the use of bamboo hoops and also how each package is tied with rice straw rope. Rice straw is a most useful article with the Japanese. Biwajima Station, Japan.



Negative #43803.

Taken at the Aichi-ken Agricultural school. Children being taught form and garden practice.



Negative #43804.

Aichi-ken Agricultural School grounds. View showing water-
melons planted between rows of wheat.



Negative #43805.

Aichi-ken Agricultural School. View of a pile of green
manure compost for use on the school farm. Near, Anjo,
Japan.



Negative #43806.

Aichi-ken Experimental Station. View showing in the foreground straw scattered overland to be plowed under. In the background rice straw piled in this manner and left since last years harvest. and further back arbor of pears.



Negative #43807.

Aichi-ken Experiment Station. View of Experiment station seed beds of rice.



Negative #43808.

Showing a portion of a field of soybeans in rows being grown to put under as green manure for rice planting.



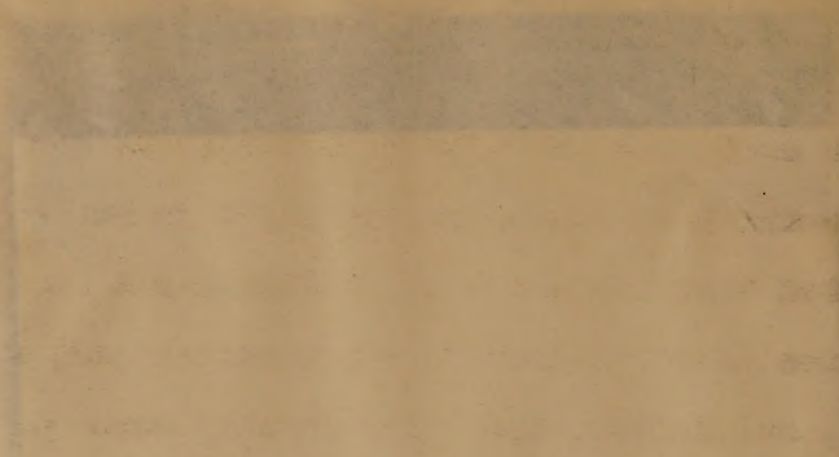
Negative #43809.

View of a portion of a Japanese farmer's field showing watermelons planted between wheat.



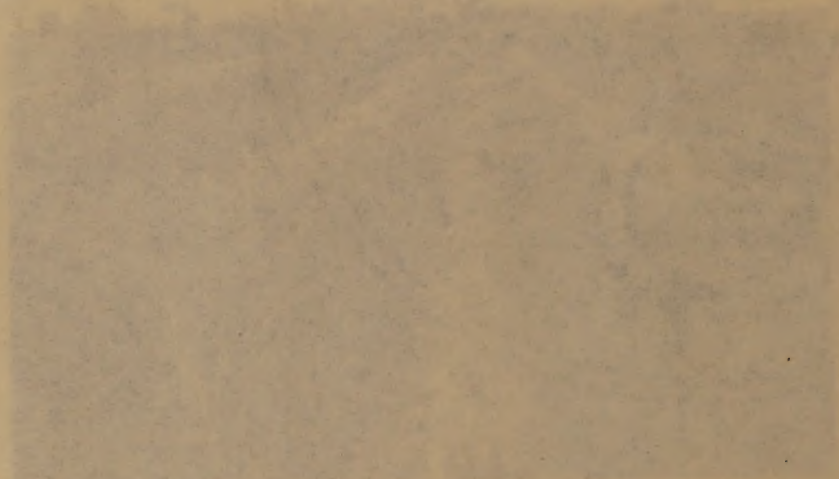
Negative #43810.

Watermelonsplanted between wheat, a row of early and late wheat is on each side of the row of melons.



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Saturday, June 1, 1929 (cont. 4)

Copied from Mr. Morse's diary:

We awoke rather early to see some of the country through which we passed in the night on our way north. It was noted that the crops and agricultural operations were very much more advanced than in the Northern part of the main island, and in Hokkaido. The farmers were observed planting rice and many paddies had already been planted. Barley and wheat were yellowing up fast and will be ready for harvest before long. Soybeans and other beans were up to a good growth.

We arrived at Ueno station, Tokyo, at 7:05 a. m. after enjoying our night on the sleeper much more than we did our first night.

Arrangements were made with the head gardener of the Imperial Hotel to grow in pots for us in the hotel's garden the following plants which we brought back in a basket: Three varieties of lily-of-the-valley; *Iris sibirica*, var. *orientalis*; *Aquilegia sikimensis* and *Fritillaria camschatcensis* (wild black lily).

Wednesday, June 1, 1903 (cont.)

Went to the house of the

to see the house of the

which we found in the night of our journey. It

was found that the house and garden were very

and very pleasant. In the garden we found

many, and in the garden. The garden was very

and very pleasant. The garden was very

and very pleasant. The garden was very

and very pleasant. The garden was very

and very pleasant.

We arrived at the house of the

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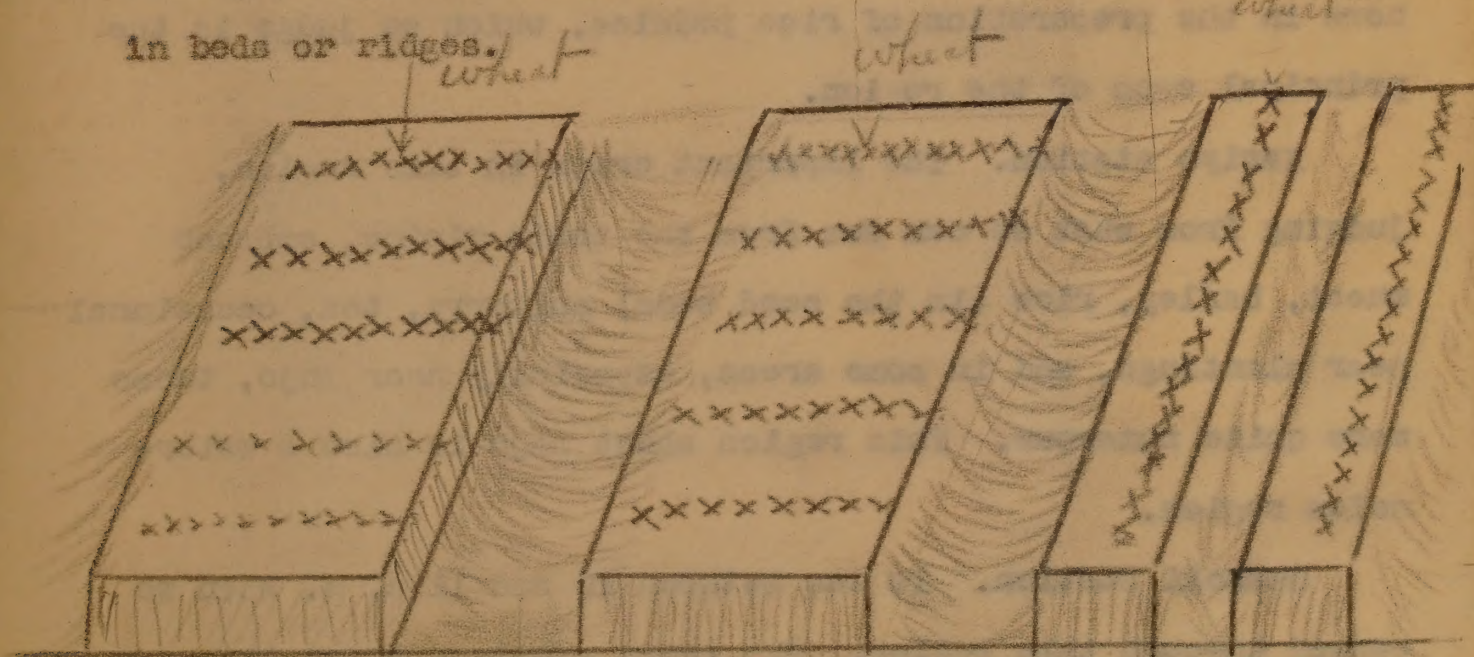
and very pleasant.

Sunday, June 2, 1929.

Left Nagoya at 9:58 this morning for Shizuoka. It proved to be a fine day and we enjoyed the ride from early morning until our arrival there at 3:05 this afternoon.

The following observations and notes were made en route from Nagoya to Shizuoka, and at Kunozan Hill where we visited in the afternoon.

At Atsuda in the outskirts of Nagoya, we saw in the gardens and yards in the villages, and at farm houses, figs, shrubs and flowering plants. A little farther on we saw what appeared to be more or less unfavorable farming conditions and after crossing several sloughs or canals we passed through quite an interesting section, largely adapted to rice growing, but where considerable wheat is being grown in beds or ridges.



At the side of each row of wheat or barley as the corn may be soy beans are planted to be turned under when the wheat is harvested and the land is prepared for rice - frequently water is found standing between the beds or ridges.

On the left at Odaka Station, we saw a good sized planting of bamboo, on the right the village and in the background rolling country, with golden patches of wheat, deep green broad beans, potatoes with their yellow crowned white flowers waiving to and fro in the breeze. On the lower levels there were only rice paddies awaiting preparation and planting. Citrus trees were to be seen here and there on the nearby hillsides. We passed on the right a good sized lake or irrigation reservoir of water, and in this region saw on the hillsides, wheat and mulberry. Much of the hillside country along here shown outcroppings of yellow clay or sand and apparently is unfit for cultivated crops.

Obu Station, out in a valley, this perhaps is about the center of the above conditions. There is considerable activity here in the preparation of rice paddies, which we judge is the principal crop of the region.

Kariyo Station. The important crops in this region, judging from what we can see from the train window, embrace wheat, barley, rice (in the seed beds) mulberry, tea, occasional pear plantings, and in some areas, especially near Anjo, these were quite numerous. This region about Anjo is also a water-melon region.

Okazaki Station. It was between 10 and 11 a. m. when we passed through this region. The crops continue about the same and are very much in the same proportion.

Koda Station, is quite close to the mountains, show quite a good deal of reforestation (the sides of the foothills and mountains). The scenery here is really very good. An island in Atsune Bay looks very attractive.

Sunday, June 2, 1929 (cont. 2).

At Gamagori Station wheat harvest is in progress. Here the soil conditions do not look to be as favorable for general farming as in other sections. In this region we see occasional citrus plantings also now and then a few trees of kaki, and in one place near the railway saw a small, but very nice young orchard of kaki persimmons.

Reached Toyohashi about 11:45. This looks to be a city of considerable size, and also as though it is quite a manufacturing city. In this region there is considerable rolling country which does not appear to be under irrigation. However, wheat and barley look to be especially good. The soil looks to be a reddish yellow clay. The lower areas are paddy patches. As we approached the mountain on the left, the land looks to be poor and much of it is covered with small pines and undergrowth of shrubs and small trees or plants.

Futagawa is on the edge of a valley on the right and on the left its more or less of a rolling country interspersed with farming operations.

At Washizu there were flowering cherry trees along the railway platform and also trees of weeping willow.

At Araimashi there is a lagoon on the right and on the left a valley containing very much golden grain. In this region eel culture is practiced to quite an extent.

Bentinjima is apparently a summer resort. It looks as though it might be a good place to go for a week-end.

We passed through Malsaki about 12:25 p. m. It looks as though it might be an interesting section to visit. wheat

and barley harvest is in progress. The soil looks to be sandy and light, perhaps this may be a good sweet potato growing section.

Tenryugawa is within a comparatively short distance from where we crossed the second largest river in this region. It is known as the Heaven Dragon river.

At Nakaizumi we saw some extensive cloth drying places (racks). We also noticed tea and tobacco in this region.

Kakigawa is about the center of the Ogasa tea activity and naturally there is considerable tea grown in this region. It is an attractive country.

Kakigawa to Horinouchi, where we saw citrus and tea on the hill slopes. In this region on a hill side the following Japanese characters in growing tea stands out in bold relief:

↑ 茶 産 地
Ogasa tea san chi

This is an advertisement for Ogasa tea.

About 2:30 we crossed the Oi River. This stream is not deep where the bridge spans it but it is very broad.

At Shimada, in a good sized valley, we saw soybeans growing in considerable quantity, interplanted in wheat. We also saw in this region considerable range of Japanese red clover.

Hochimune, we arrived here about 3:00 p. m. This city is between the bay and mountains and very nicely located. We saw growing in this region citrus, kaki, peaches, tea, wheat, barley, rice seed beds and quite extensive areas devoted to pear culture.

Arrived at Shizuoka, our destination at 3:05 p. m. and

Sunday, June 2, 1929 (cont. 3).

went direct to the Atsuta Inn. After selecting Japanese rooms (they had European) and getting tea, we came out for the purpose of taking a bus for Kunozan. We found quite an assembly of Japanese before the Inn, especially children, girls and women (and some men), they had gathered (so we were told) to see Princess Tokugawa, who was leaving on the 4:20 train for Tokyo. Our bus left before the Princess came out so we failed to see her.

We expected to climb to the shrine on top of Kunozan Hill, but got no further than a short distance through the entrance torii.

We became interested in some plants; and there met Mr. Matsuzi Kowashima, and made arrangements for him to collect seed of the plants which took our fancy.

We found his Ume plums affected by a spot disease and got specimen, also saw a disease on fruit of loquat which is quite serious in this section.

This is what is known as a natural forcing section for vegetables and strawberries, and is a most interesting section. As we were not able to accomplish what we wanted to out here this evening we will try to return before leaving Shizuoka.

We returned to the Inn at Shizuoka where we had a good dinner. Before retiring we planned to visit the market in the morning and then go out to the Experiment station. Such of the pictures made today as are worth while follow:

Copied from Mr. Morse's diary:

Tokyo, Japan. Went to the office and developed films of scenes taken in Hokkaido. The seeds and plants obtained in Sapporo and Hakodate were numbered and notes written concerning each.



Negative #43811.

View of portions of plantings of cucumbers, tomatoes, beans, etc., in the trucking area along the Bay out from Shizuoka, Japan.



Negative #43812.

A mumeoplum tree in full fruit. The tree has a spot or shot hole fungus on the leaves and on the fruit. Zo Shimizu City, near Shizuoka, Japan.

negative result.
 view of position of elements of compound, however, shows, in the preceding case, that the two elements, in the preceding case, are not the same.

negative result.
 A single case is not sufficient to establish a rule, or to show that a rule is not a rule, or to show that a rule is not a rule, or to show that a rule is not a rule.

Monday, June 3, 1929.

Visited two small markets in Shizuoka, Japan, this morning and listed the following fruits and vegetables:

Vegetables.

Spinach.
Cucumbers, in abundance.

Potatoes, new and old.
Onions, new and old and for pickling.
Turnips.
Peas, shelled and edible pod.
Cabbage, head.
Bamboo shoots, Hachi-ku, this variety is cut in June.
Dashen shoots.
Lettuce, long and round headed.
Carrots.
Perilla, for seasoning.
Daikons.
Parsley.
Ginger, roots and shoots.
Broadbeans.
Lotus roots.
Squash.
Brassica, in variety.
String beans.
Fuki.
Garlic.
Peppers, small red, dry.
Egg plant.
Cobo.
Mitsuba.
Tomatoes.
Pepper tree buds and young leaves.

Fruits.

Small Umi fruit for pickling.
Oranges.
Pears.

From the market we went out about half a mile to the Shizuoka Agricultural Experiment Station and first met Mr. Kimijiro Noro, Pomologist of the station. Mr. Noro speaks and understands some little English. He told us that the original home of the Gero persimmon, which is non-astringent, Mori Machi, Shuchi-gun and a little later made a print (5 x 7) of the tree and presented it to us. This is the variety most generally grown in this region. He told us that the variety Saijo, growing generally at Okayama Hirishima, Shikoku, Japan

is one of the best for drying. The stock used in this region are principally seedlings of any astringent variety but that seedlings of non-astringent varieties are also used.

In response to our inquiry relative to Japanese pears, Mr. Noro told us that the variety known as Choguro is most generally grown in this region. This variety and Negesake are troubled with a disease known as red spot.

What, in this region is quite generally known as natural vegetable forcing, which we judge means hot bed forcing of vegetables. The soybeans we saw yesterday en route from Nagoya, Director Takaishi tell us, are for green manure, and between the 15 and 25th of June will be hoed into the rice paddy land. Prof. Noro told us that there is a great deal of loss each year, in Japan, on account of frost injury to Japanese tea.

Mr. Noro called at the Inn this evening and we spent a very pleasant evening. He brought with him several publications, one especially was of particular interest. It is "The Crab-apples and Nectarines of Japan" by Yashichi Asumi, Naka, Shibuya, Tokyo. It has many colored plates and is in English.

We asked him about the forcing frames for vegetables in the vicinity of Kunozan. They use cotton dust with rice straw for the production of the artificial heat in the forcing frames, in practically the same way in which we use stable manure.

We were advised that 1,666,000 pounds of cotton dust is annually used in this section in the making of forcing frames. The vegetables forced are lettuce, egg plant, cucumbers, melons, etc., and in the open, strawberries are grown in winter.

Copied from Mr. Morse's diary:

Tokyo, Japan. The day was spent in arranging the material obtained in Hokkaido for sending to the Department. Sufficient seed, bulbs, and tubers were obtained for two more full-weight parcels to be sent to the Foreign Plant Office.



Negative #43813.

A market scene at the second market visited in Shizuoka, Japan.



Negative #43814.

View near the Agricultural Experiment Station grounds, water on a rice paddy in the foreground, and further back tea under a grape arbor.



Negative #43815.

Soybeans grown for green manure to be turned under at rice planting time. Shizuoka, Japan.

Negative #43816.

Mr. Noro standing by a
7 year old persimmon
tree at the Agricultural
Experiment Station
at Shizuoka, Japan.





Negative #43817.

Mr. Y. Ku rihara standing in an arch covered with silver Moon in full bloom. Agricultural Experiment Station Shizuoka, Japan.



Negative #43818.

Agricultural Experiment Station, Shizuoka, Japan. Securing seed of *Elaeagnus* sp. for shipment to America.



Negative #43819.

View from Kunozan Hill over a portion of Shizuoka.



Negative #43820.

View from Hill in another direction showing rice paddies to grain and other crops in the foreground, and a part of the city further back. Shizuoka, Japan.

Tuesday, June 4, 1929.

It was rather close during the night and in the morning it was still rather warm and also cloudy.

Mr. More called about 8:30 a. m. and shortly there after we were on our way for a day's tramp to the Shogun Ieyasu Shrine at the top of Kunozan Hill, 1159 steps above the first stop at the torii entrance near the base of the Hill, we also went to the vegetable and strawberry section along Awari Bay front.

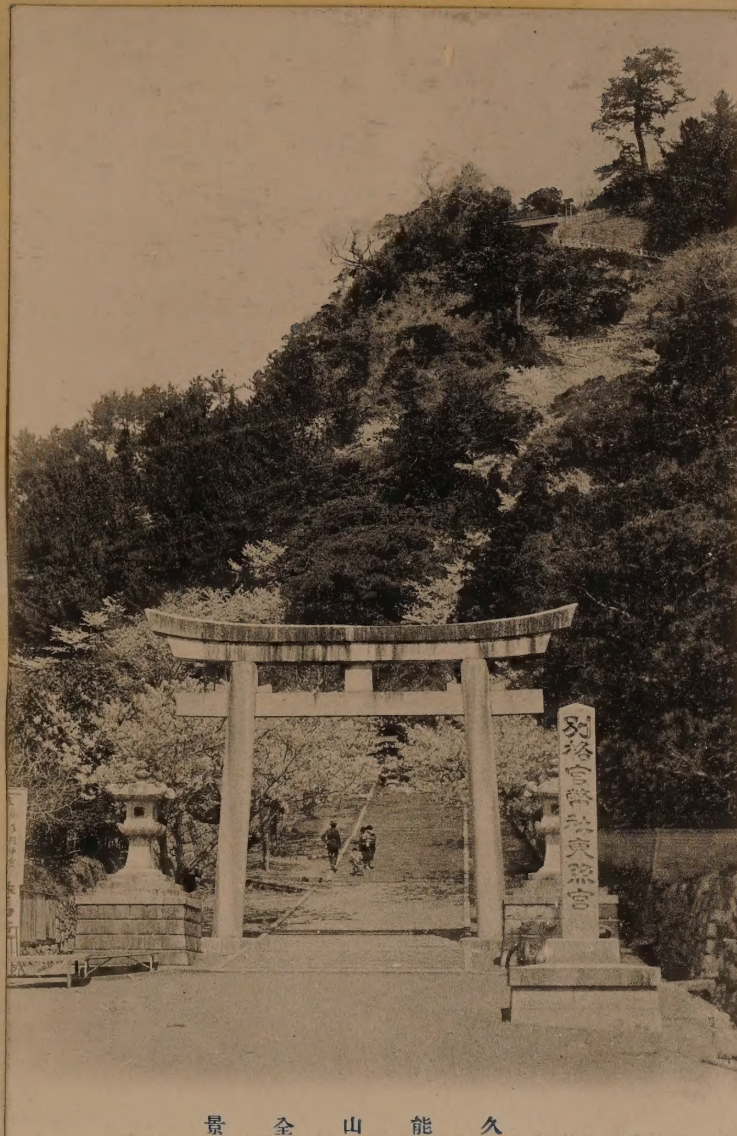
It took us some little time to climb to the shrine at the top of Kunozan, however, the numerous views and lookouts were well worth the effort it cost to reach the top. On the way up we collected seed of flowering cherries from several trees, for sending home. In doing this we had two objects in view, one the possibility that they might prove valuable for stocks or for the purpose of selecting interesting new strains; and second, that they might be of historic value.

We made a few pictures on the way up, looking out in several directions, these will follow later. As the taking of pictures of the shrine is not allowed, we secured post card views which will give some little idea of the grandeur and beauty of the important features incident to the climb and the shrine.



山能久ルタ見リヨ上海

Hunozan Hill with the shrine at the top, evidently taken from a position out on the bay.



久能山全景

Stone torii and lanterns and showing the first flight
of stone steps, at the base of Kunozan Hill.
Near Shizuoka, Japan.



久能山登道ノ一部

This shows one of the many curved flights of stone steps with the stone balustrade. Kudozan Hill.



久能山東照宮物見の松

A remarkably fascinating old pine tree reached a short distance before getting to the shrine.



面側社本宮照東山能久

The main Shrine building at the very top of Kunozan Hill. Near Shizuoka, Japan.



Negative #43821.

View out over the bay from fairly well up the Hill. In the foreground is a portion of the city and just beyond plantings of tomatoes, cucumbers, etc., Kunozan Hill, near Shizuoka, Japan.



#43822.

A fairly nearby view of a very pretty climbing creamy white flowered vine which we believe is jasmine.

Negative #43822.



Negative #43823.

In the foreground to the left on a drying board is a portion of a Japanese Kimono, these shieves of barley and the heads of barley drying on the ground.

1358



Negative # 43824.

Panoramic view from Kunozan hill showing trucking
area and beach of bay. Shizuoka, Japan.

A fairly good view of a
very pretty building which
was the main view which
the artist is trying to
show.



The building is a
very pretty building which
was the main view which
the artist is trying to
show.

Tuesday, June 4, 1929 (cont 2).

After returning from our trip to the top of Kunozan Hill we went to see Mr. Daikichi Hagawara, and to look over his extensive and unique layout for the winter growing of strawberries.

Mr. Hagawara has, what looks to us to be several acres, extending from the back of his home, which is not more than a thousand feet or so from the bay, half or three-quarters of the side of a hill which looks every bit as high as Kunozan Hill.

His forcing beds are the lower half of the area made of water washed rubble stone laid up at an angle of about 60 degrees. The walls are about five feet in height. The strawberries are planted in rows, lengthwise of the embankment, and 9 to 12 inches apart each way. For the remainder of the planted area the beds are faced with concrete blocks which in size are 2" x 6" x 18", each with three V shaped openings on one side, the openings are about 3" from each end and 6" apart. These are so laid out that the openings in the row above and below are staggered.



一ノ其 培養の苺崖石 (産名能久)

Post card showing in a general view a portion of Mr. Nagawara's strawberry planted area.



二ノ其 培養の苺崖石 (産名能久)

Post card showing in the foreground rubble planted strawberries in the extreme right hand corner are strawberries planted in the concrete block faced beds.



實 結 の 苺

(産名能久)

A close-up picture of strawberries planted in the water washed rubble stones.

Mr. Hagawara told us that he prefers the natural stone for the lower level and the artificially made concrete block for the higher areas.



Negative # H38-5.

View of a strawberry forcing hillside belonging to
Mr. D. Hazawara. Near Shizuoka, Japan.



Negative # 43726.

View of strawberry forcing hillside of Mr. Hagiwara
taken from the left of his place, near Shizuoka, Japan.



Negative # 43727

Panoramic view of strawberry facing hillside of
Mr. Hagiwara from the right side. near Shizuoka,
Japan.

Tuesday, June 4, 1929.

Copied from Mr. Morse's diary:

Tokyo, Japan. We left in the morning with Mr. Suyetake to visit the Silk Worm School at Nishigahara. This school takes in the entire silk industry for the students from the rearing of the silk worms to the small silk mill where silk is prepared for the silk cloth. In addition to the teaching and practical laboratory work of the students, the professors in charge conduct extensive experiments on different silk producing insects, different kinds of silk ~~worms~~ worms, diseases of silk worms and mulberry trees, different varieties of mulberry, and various methods of feeding.

The school is a most excellent one and consists of a large group of buildings. In one group of buildings rooms are assigned students for silk worm experiments while in another group silk worm experiments are being conducted by the professors.

There is also an extensive exhibit of the silk industry showing all phases from the silk moth to the finished silk product, a Japanese kimono. It takes about 225 pounds of mulberry leaves to raise silkworms from the eggs of eight moths. About six gallons of cocoons are spun by 3000 silk worms from the eggs of the eight moths. About one and one-fourth pounds of raw silk is reeled from the six gallons of cocoons. A silk kimono weighing about seven pounds takes about one and one-fourth pounds of raw silk.

We were shown the silk mill and given information concerning the work. It contains all machinery even the old

method of reeling to the most modern. We were unable to see the mill in operation as it runs only on Wednesday, Thursday and Friday.

Wednesday, June 5, 1929.

went to the office early this morning to get things in shape and get to developing the pictures made during the Exploration trip to Kyoto, Nara, Nagoya, Gifu and Shizuoka. And into Hokkaido.

Received considerable personal and official mail, which was very much appreciated. Got 200 feet of motion picture film (black and white) and 6 or 8 dozen still pictures developed. In both cases they are very good. The still pictures will be included in our field trip report under the date on which they were taken.

Got two packages ready for parcel post shipment. Mr. Suyetake took them over about 5:30 p. m. but could only send one as the other was over-weight, and he had to bring it back. We will try to get this and the herbarium specimen off tomorrow and will also try to finish the development of the balance of the still and motion pictures.

Mr. Morse and family got back Saturday, June 1st, from their trip to Hokkaido and the Dorsetts returned last night.

Copy of a letter to Mr. Ryerson relative to our trips and in answer to his letters of April 7th and 10th as well as copies of these letters follow.

an extraordinary amount of work is being done
 with the office staff in connection with the
 plans and not in developing the plan itself. The
 information is to be given, given, given, given, given,
 and the results.
 The office staff is given and official staff, which
 was very much appreciated. The 200 feet of the plan
 (the plan and staff) and 5 or 6 feet of the plan
 developed. In both cases they are very good. The staff
 plan will be included in the plan. It is very much
 the data on which they are based.
 But the packages ready for parcel and shipment. Mr.
 Edwards took them over about 1930 p. m. but could only find
 one as the other was over-weight, and he had to bring it
 back. He will try to get this and the remaining packages
 off tomorrow and will also try to finish the development of
 the balance of the staff and action plan.
 Mr. Brown and family got back yesterday. Mrs. Brown, Mrs.
 Fair and Mr. Fair and the children returned last night.
 Copy of a letter to Mr. Brown relative to the plan and
 in answer to the letter of 19th Feb was sent as well as
 copies of some letters before.

Thursday, June 6, 1929.

Today we finished developing motion and still pictures taken on our recent trips and worked on getting off a shipment of recently collected seed, and other plant material.

Thursday, June 6, 1935

Took us through the developing section and still the same

saw many recent signs and worked on getting all

a number of recently collected seeds, and other

specimens.

Saturday, June 8, 1929.

Wentover to Hibiya Park this morning and looked over a large instillation of late flowering azaleas.

It proved quite attractive and very interesting, is in the form of a rectangle about 180 feet wide by 370 feet in length. See diagram of ground space on following page. The exhibit booths are around 3 sides, and all covered with Tarpolen, 3 sides of the exhibition booths is of white cotton.

The exhibits are from private growers, gardeners and nurserymen. Some of the plants look to be several hundred years old. The exhibits contain some uniquely trained plants and most attractive colors. Small petal reds, light pink, almost white with out rim of bell shape, from pink, light lavender, salmon, and pure white. The exhibit holds fourth forth for about a week.

There has been a string of people inspecting the display all day. We secured illustrated literature of the display to send to Mr. Ben Morrison, we feel sure that he will be interested in looking at the pictures even though he may not be able to read what is said about them.

From the flower exhibit we went through the park and collected a herbarium specimen and ripe fruit of a rubus for seed. Put in the balance of the day getting up my account and itinerary for the month of May.

Wednesday, January 1930.

Remover to High Park this morning and passed over a

large collection of late flowering orchids.

The above date alternative and very interesting, is in

the form of a rectangle about 150 feet wide by 370 feet in

length. One diagram of ground space on following page.

The exhibit houses are around 3 sides, and all covered with

temples. 3 sides of the exhibition house is of white cotton.

The exhibits are from private gardens, greenhouse and

nurseries. Some of the plants look to be several hundred

years old. The exhibits contain some uniquely treated plants

and most attractive colors. Small plants, light blue,

almost white with one or two of half range. Very light

flowers, yellow, and some white. The exhibit house stands

forth for about a week.

There has been a string of people inspecting the

display all day. No account illustrated illustrations of the

display is sent to Mr. J. M. Harrison. We feel sure that the

will be interested in looking at the display even though

no one has been to look at it in the past week.

From the flower exhibit we went through the park and

collected a number of specimens and the fruit of a tree for

seed. But in the house at the top of the hill we saw

and likewise for the house of Mr.

Ground plan
 of
 Azalea exhibit-
 in
 Hibiya Park
 Tokyo, Japan.
 June 8-1929

Sunday, June 9, 1929.

Made about 12 feet of colored motion pictures of water lilies, red, pink, yellow and white in a small lake in Hibiya Park. Also made and developed a number of $3\frac{1}{2} \times 4\frac{1}{2}$ still pictures with and without a ray filter.

Went through the azalea exhibit in Hibiya park again. It was crowded with people from early morn until after dark. There are some fine things there which we will try to arrange to get later.

Spent most of the day answering personal and official correspondence.

Such of the still pictures made today as are worth while follow:



Negative #43843.

View of waterlilies in the small lake on the west side of Hibiya Park. This view was taken with a K-1 filter. See #43847.



Negative #43844.

View of water lilies in the small lake on the west side of
Hibiya Park, Tokyo, Japan. See #43845.



Negative #43845.

Practically the same as #43844. K-1 filter used. Good light.



Negative #43846.

View of a portion of lake and water lilies through the branches of weeping willow. Hibiya Park, Tokyo, Japan.



Negative #43847.

View from the south west corner of the small lake over white, red and pink, but mostly white, water lilies, to the left and fairly well back, stone steps to a small summer house. Hibiya Park, Tokyo, Japan.



Negative #43848
43848.

View of a portion of an attractive little rock garden
to the left of the formal planting in Hibiya Park.



Negative #43849.

A nearby view of a small leaved and small white flowered
shrub as a low hedge plant. This is also used effectively
as a flowering shrub in and out of rockeries.

Monday, June 10, 1929.

Clear, bright day, a little warm, but not uncomfortable. Put in the day at the office making out our accounts, and replying to official correspondence.

Sent a roll of colored motion picture film to Mr. Harold S. Ryerson, of the Du Pont Vitacolor Corporation, this is the 12th roll we have exposed and sent in for development.

the first of these is the fact that the
the second is the fact that the
the third is the fact that the
the fourth is the fact that the
the fifth is the fact that the
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the tenth is the fact that the

the eleventh is the fact that the

the twelfth is the fact that the
the thirteenth is the fact that the
the fourteenth is the fact that the
the fifteenth is the fact that the

Wednesday, June 12, 1929.

Cloudy and cool. The Horses with Mr. Guyotake went out to Urawa, Japan to botanize and take pictures. The Dorsetts remained at the office and wrote official letters. Also cleaned about 500 grams of flowering cherry seed which came in from Mr. Masada of the Bureau of Nara-ken Parks, Nara-ken, Japan.

This seed was sent at our request and later in the season we hope to get additional seed from that section.

Wednesday, June 11, 1935

Cloudy and cool. The horses with W. Spence
went out to pasture, again to pasture and some plowing.
The horses remained at the mill and were milled
later. Also cleaned about 500 yards of livestock waste
which was in the W. Spence of the farm of
Horseman Farm, Horseman, Texas.
This work was done at our request and later in the
season we hope to get additional work from that section.

Thursday, June 13, 1929.

Cool and cloudy throughout the day. Worked at the office with plant material and official correspondence.

Mr. Suyetake spent a good part of the day trying to find paper for use in drying herbarium specimen, but did not succeed in finding anything suitable.

Thursday, June 12, 1902.

cool and cloudy throughout the day. Several in the
office also paid attention and official correspondence.
Mr. [Name] spent a good part of the day trying
to find paper for use in trying [Name] [Name]
but did not succeed in finding anything suitable.

Friday, June 14, 1929.

Cool and cloudy today. The Horses went to the rice, wheat and barley field to collect seed and herbarium specimen, also to secure motion pictures of farming scenes and farming operations.

The Dorsetts worked at the laboratory writing official letters and working up their field trip report of their trip to Kyoto, Kobe, Nara, Nagoya, Gifu and Shizuoka.

Friday, June 16, 1905.

Cool and cloudy today. The horses went to the
 river, where and during the day to collect seed and specimens
 specimens, also to secure motion pictures of breeding scenes
 and feeding operations.
 The foreman worked at the laboratory writing official
 letters and working up their field trip report of their
 trip to Egypt, Syria, Mesopotamia, and Palestine.

Saturday, June 15, 1929.

Worked at the office handling official mail
and working on The Field Trip report.

January, 1911, 1912

Report of the office handling official and

and writing on the field trip report.

Sunday, June 16, 1929.

This morning we went with Mr. Ikeda, an interpreter and friend of Mr. Shinkichi Miyojima, Head Gardener of the Imperial Hotel, Tokyo, Japan, to Horikiri, just outside of the city to see a couple of Iris gardens.

After leaving the train at Horikiri we walked across a river and canal and then some little distance into a village.

The Iris garden comprised about an acre of low ground with walks on ridges. For the most part the Iris, which are in considerable variety, are growing in water. The plants varied from 18 or 20 inches in height to about 36 to 40". The colors were white, white with a pinkish tinge, blue, purple, light and dark lavender, light and deep and several mottled colors. The size of the flowers was greater we think, than we have ever seen before. We feel sure they were 6" to 8" or more across. Among them the following, we thought to be most attractive.

Zamamori, a lovely blue striped with white.

Hinodenotsuru, dark pink striped with white.

Hinodentsuru, but somewhat different from the above.

Miyakono sen, white petals with blue lines.

We made 17, $3\frac{1}{2}$ x $4\frac{1}{2}$ still pictures, 100 feet of colored motion pictures and about 150 feet of black and white motion pictures.

It was rather dull cloudy but otherwise very pleasant today, and we enjoyed seeing a real Japanese Iris garden very much.

Cut flowers of Iris were offered at almost every turn.

and along the way to the iris garden about half a dozen long stemmed flowers sold at 10 sen per bunch. They were wrapped inn newspaper. The colors were usually blue, lavender, white and pink. The last named color resulted from red ink absorption by the white flowered kind.

We had a most enjoyable time. Such of the pictures made today as are worth while follow:



Negative #43850.

A rather distant view over beds of blooming iris. Horikiri, Japan.



Negative #43851.

Different colored iris in the foreground, and tea houses in the background. Horikiri Iris Gardens, Horikiri, Japan.



Negative #43852.

Iris blooms in the foreground, stone lantern near the center of the field. Horikiri Iris Gardens, Horikiri, Japan.



Negative #43853.

A rather nearby view of iris, to the right a foot bridge
the cross poles of which are bamboo, to the left a
lovely old pine branch.



Negative #43854.

Nearby of flowering iris and tea houses in the background.
Horikiri Iris Gardens, Horikiri, Japan.



Negative #43855.

Blooming iris in the foreground and an open tea house in the background. Horikiri Iris Gardens, Horikiri, Japan.



Negative #43856.

Blooming Iris in the foreground, a group of Japanese visitors further back. Horikiri Iris Gardens, Horikiri, Japan.



Negative #43857.
A rather distant view in the Horikiri Iris Garden,
Horikiri, Japan.



Negative #43858.
A rather distant view in the iris garden.



Negative #43859.

A nearby of a fine large purple iris bloom. Some of the blooms (most of them) measured fully 8" in diameter.

Horikiri, Japan.



Negative #43860.

To the right are iris of various colors, to the left a Japanese gentleman and his little boy posing for a picture.



Negative #43861.

Blooming iris in the foreground and a group of visitors posing on a small foot bridge further back. Horikiri Iris Gardens, Horikiri, Japan.



Negative #43862.

Iris and a stone lantern at Horikiri Gardens, Horikiri Japan.



Negative #43863.

Iris blooms and a portion of the crowd admiring them.

Horikiri, Japan.



Negative #43864.

A rather distant view in the Horikiri Iris Gardens at

Horikiri, Japan.



#43865.

Bamboo lumber yard, the
largest we have thus far
seen. Opposite the
Asukasa Station, Tokyo,
Japan.

Negative #43865.



Negative #43866.

View of one of the tea houses at Horikiti Iris Gardens, cov-
ered with cedar bark.

Monday, June 17, 1929.

Wrote a number of official letters. Jacketed a number of negatives; developed two rolls of standard motion picture film, black and white, and both were very good. Mailed roll #13 to Harold S. Ryerson for development and sent a box of seed and plant material by parcel post to the office at Washington.

Wednesday, June 18, 1929.

Left the hotel at 7:30 this morning for the purpose of going to Onagata Mura, Minami Tama-gun, Tokyo-fu, to see and if possible, photograph a very old and historic flowering cherry tree.

It was cloudy and threatening when Mr. Suyetake left the hotel but did not begin to rain until we were well on our way. We boarded the elevated at Shimbashi station and changed at the Tokyo Station and again at Shinjuku. Here we had to wait about 20 minutes. We left there about 8:43 and arrived at Asakawa at 10:03. It was raining when we left the train to take a bus, and when we arrived at Onagata mura, where we left the bus for about half a mile walk to the cherry tree, it was raining hard.

We bought two kasa and started for the tree on the way out it was raining so hard that we stopped at a farm house and left our 5 x 7 and motion picture camera to get on our return. It was about 11:00 a. m. when we got to the tree.

It is said to be 700 years old, it was blown over many years ago and almost all of the original trunk, which looks to have been 8 or 10 feet in diameter has rotted from the old decaying trunk and roots have grown about half a dozen sprouts and ~~and~~ or young trees which range in diameter from 6 to 10 or 12 inches and 25 to 30 feet high.

The tree is near the road and a house, we got permission to get some seed and then made, in the rain, a couple of 3½ x 4½ pictures.

On trying to get information about the tree, we learned that the gentleman who owns the tree lived only a short distance

away so went over to see him.

It is Mr. Tomikichi Kimura, Onagata, Onagata-mura. Minami Tanii-gun, Tokyo-fu. We found this gentleman at home. He is 70 years old. He received us cordially and after talking for a while his wife served tea.

He showed us a picture of the tree which was made some 25 years ago. It looked then very much as it does now. He let us take the picture to copy and we are to return it. A History in Japanese is on the back of the picture, we will copy this also.

Mr. Kimura has a lovely little Japanese garden at his home. It really is a dream only about 25 to 50 feet square. We made several $3\frac{1}{2} \times 4\frac{1}{2}$ pictures of it in the rain, then bid these good people goodbye and returned to get our other cameras and strolled down in the rain to the cross roads to get the bus. While waiting for the bus it got much lighter so we decided to return with the 5 x 7 and motion picture cameras and try to get pictures of the cherry tree and the Japanese garden. The rain had practically ceased.

Then we got back to the cherry tree and got our 5 x 7 camera set up, it started raining again. However, from under a kasa we made three pictures then went back to Mr. Kimura's and made three 5 x 7 pictures of the garden. Also three colored motion picture shots all from under a large kasa or Japanese umbrella.

This region is in a foot hill country which is quite attractive. The principal crops are wheat, barley, mulberry, potatoes, buckwheat, lilies, which we assumed were for eating but on inquiry found that they are Bermuda lilies and

are being grown for shipment to the United States.

Such of those as are worth while of the pictures made today (13 exposures) will follow:



Negative #43867.

What remains of the trunk of an old historic flowering cherry tree. Picture made in the rain. The tree at the extreme right is not a part of the old tree. see #43874-5-6 and #43868.



Negative #43868.

A distant view of the group of trees growing from the old stump and trunk of the old tree. Seed sent in under #331.



Negative #43869.

Showing a corner in Mr. Kimuro's small garden taken from under an umbrella in a down-pour of rain.



Negative #43870.

View showing another section of Mr. Kimuro's small but very beautiful garden.



Negative #43871.

Another view in Mr. Kimuro's small home garden, taken from under a kasa or umbrella to protect the camera from the rain.



Negative #43872.

A nearby picture of a pink and white azalea, it shows 7 combinations of these two colors. Taken in Mr. Kimuro's garden.



Negative #43873.

A portion of a small planting of lilies said to be grown for shipment to the United States, likely Hanoi (?).



Negative #43874.

A nearby picture of what is left of a 730 year old flowering cherry tree, which belongs to Mr. T. Kimuro. See copy of picture made 26 years ago (picture #43882), also translation of Japanese recorded on the back of that picture. (see #43881). The present trees except the one to the extreme left are from the old stump and trunk.. The small stone monument on one side bear inscriptions in Japanese characters concerning the tree.



Negative #43875.

A side view of the same 730 year old cherry tree shown in pictures #43874-6-7-8.

The tree to the right is not a part of this old tree.

Seed sent in under #331.



~~#43877.~~
Negative #43876.

#43876.

A distant view of the tree shown in pictures #43874-6-7-8.

The larger tree to the right is not a part of the old cherry tree.



43877.
Negative #43887.

View showing the entrance to and a portion of a lovely small Japanese garden at the home of Mr. T. Kimuro, the owner of the 730 year old cherry tree. This, like all the other pictures made today, was made from under a Japanese kasa or umbrella in the rain.

Negative #43878.

Another view of this fascinating small Japanese garden of Mr. Kimuro's.

We do not know where we have seen so attractive a small garden. Made from under a Japanese kasa or umbrella to protect the camera from rain.





Negative #43879.

Still another view of the small garden of Mr. T. Kimuro's,
which is so very fascinating and beautiful.

Wednesday, June 19, 1929.

Worked at the office jacketing pictures and writing legends. Packed black and white picture rolls 14, 15 and 16 and sent the package by parcel post to Mr. Ryerson, chief of the office of Foreign Plant Introduction, Bureau of Plant Industry, U. S. Department of Agriculture, Washington, D. C.

About 2:00 p. m. Mr. Sakata from the Sakata Nursery Company at Yokohama, called at the office and remained all evening and took dinner with us.

He is interested in growing vegetable seed of high grade Japanese vegetables for export to the United States. He showed us his list of varieties with Japanese name and characters, and the romanization of the Japanese name. He also has a condensed description of the varieties.

He let us have this manuscript to copy for our file. At the end of today's notes this copy will follow.

Mr. Sakata impresses us as being a very fine gentleman and no doubt he will be a good cooperator of the office in case his assistance is desired.

Made the following pictures today:



Negative #43880.

Picture of the large tree transplanted to this position
in front of the Sankaido Building.

名 称 邊 名ノ櫻
所在地 東京府南多摩郡恩方村下恩方小字櫻木
沿革 元暦年間皇山重忠鎌倉通行ノ砌リ植付ケム
ルモノナリト云フ往古ハ幹ノ太サ三丈枝葉東西七
間四尺寸南北一丈五間八寸ニ散茂セシト云フ
(以上恩方村誌)本樹見シテ所在地字名ヲ往古
ヨリ櫻木ト稱ス(以上当地書上)

樹 齡 七百三十一年

現在状態

往古枝葉枯腐シテ時枯死ノ類セシニ數多ク新
枝ヲ生シテ再ニ散茂シ高サ五間ニ達シ新枝ヲ
簇生セシ新根ハ地上五尺ノ長アリ朽腐セシ主幹
ニテハ地中ニ伸長シテ奇觀多シ主幹朽腐
セシト雖モ尚圍圍式丈六尺ヲ有ス

幅 度

東西四間 南北五間

眺望 佳

所有者 東京府南多摩郡恩方村下恩方

木村 富 吉

撮影年月日 大正貳年四月十二日

備考

本樹ハ二貝倒伏セル如キニ倒伏セシニ下ノ
土塊ノ如ク見エハ主幹ノ朽腐セルモノニテ
ニ顯シテ根ハ主幹ノ朽腐セルモノノ後主幹
枝ハ一部ヲ發見セルモノニテ左方ニ横ハレル主幹
ニ部ヲ發見セルモノニテ枝ニテ自然ニ生シテ地
ニ接セシモノ目下散茂セルモノニテ新枝ナリ

附記

此樹真ニ東京府南多摩郡恩方村下恩方小字櫻木
本多摩大氏主任トリ同敷室ニ在リ全國ノ老樹名木ヲ
調査シ世に傳ヘテ名山名木ヲ大日本老樹名木ニ
出版ス内主任氏ノ三百餘種ノ老樹名木ニ
十ノ大正三年五月二日同博士ニ提出ス

Negative #43881.

Copy of Japanese record of 730 year old cherry tree shown
in picture #43882.

Negative #43882.

Copy of the picture of 730 year old cherry tree made 26 years ago. see picture #43881.



View of the large tree located just to the right of the roadside building.

INDEX OF VARIETY OF VEGETABLES

OFFERED ABROAD.

Japanese Cucumber. キウリ 味 雄 向

- | | | | |
|------------------|---------|-----------------------|-------|
| 1. Kana Sawa. | カガフシナリ | (Kaga Fushinari) | 加賀節味 |
| 2. Kariha. | カリハ | (Kariha Fushinari) | 刈葉節味 |
| 3. Tokyo Market. | マコノ | (Magono Fushinari) | 馬込節味 |
| 4. Green Giant. | オウアオキウリ | (Ao Okyuri) | 青大胡瓜 |
| 5. Chinese Long. | シサレキウリ | (Shina Sanjaku Kyuri) | 支那大胡瓜 |

Japanese Cucumber Melon. シロウリ 雄 向

- | | | | |
|-----------------|--------|-------------------|-------|
| 1. Tokyo Early. | トウキヨウロ | (Wase Shirouri) | 早生雄向 |
| 2. Tokyo Giant. | トウキヨシロ | (Tokyo Oshirouri) | 東京大雄向 |

Japanese Canteloupe. マスクウリ 雄 向

- | | | |
|--------------------|--------|-------|
| 1. Nashi Nakuwa. | ナシマスク | 梨 雄 向 |
| 2. Kin Nakuwa. | キンマスク | 金 雄 向 |
| 3. Gin Nakuwa. | ギンマスク | 銀 雄 向 |
| 4. Natsume Nakuwa. | ナツメマスク | 夏 雄 向 |

Japanese Watermelon. スイカ 雄 向

- | | | | |
|-----------------|-----|----------------|------|
| Japanese Sweet. | ヤマト | (Yamato Suika) | 大和西瓜 |
|-----------------|-----|----------------|------|

Japanese Squash. トウナス 雄 向

- | | | | |
|-------------------------|-------|--------------------|--------|
| 1. Yokohawa. | キウサ | (Kikuza Kabocha) | 菊色南瓜 |
| 2. Tokyo Market. | チリメ | (Chirimen Kabocha) | 菊色南瓜 |
| 3. Early Black-skinned. | | (Wase Kokabocha) | 早生黒皮南瓜 |
| 4. Sakamatau. | サカマタウ | (Amaguri Kabocha) | 甘栗南瓜 |
| 5. Kyoto. | キョウト | (Saikyo Kabocha) | 西京南瓜 |
| 6. China Noodle Marrow. | キンシ | (Kinsai Uri) | 金糸南瓜 |

Togan. トウカシ 雄 向

- | | | | |
|-------------|--------|----------|-----|
| Late Giant. | オウトウカシ | (Otogan) | 大冬瓜 |
|-------------|--------|----------|-----|

Yugao. エウガ本 扁 痛

- | | | | |
|-----------------|--------|--------------|-----|
| 1. Long Yugao. | ナガエウガ本 | (Naga Yugao) | 長扁痛 |
| 2. Round Yugao. | マンエウガ本 | (Maru Yugao) | 丸扁痛 |

Japanese Radish. ダイコン 大 根

- | | | | |
|----------------------|--------|------------------------|-------|
| 1. Sakurajima Giant. | サクラジマ | (Sakurajima Daikon) | 桜島大根 |
| 2. Shogoin. | シヨウゴイン | (Shogoin Daikon) | 整撥院大根 |
| 3. Nerima. | ネリマ | (Nerima Daikon, Onaga) | 珠馬大根 |
| 4. Miyashige. | ミヤシゲ | (Miyashige Daikon) | 宮室大根 |
| 5. Nino Early. | ニノイ | (Minowase Daikon) | 美濃早大根 |

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 7. Summer Radish. ナツダイコン (Natsu Daikon) 夏大根

Turnip. カブ 蕪

1. Sakata's Improved Solage Turnip. ショウゴインカブ 畦蔭院蕪 (Shogoin Kabu) 尾張蕪
 2. Nagoya. オウリカブ (Oharu Kabu) 夏蕪
 3. Summer Turnip. ナツカブ (Natsu Kabu) 時無蕪
 4. All Season. シキカブ (Tokinashi Kabu) 小蕪
 5. Tokyo Market. コカブ (Kokabu) 伊予洲蕪
 6. Iyo Crimson. イヨヒカブ (Iyo Hinokabu) 青蕪
 7. Green Turnip. アオカブ (Ao Kabu)

Carrot. コレジン 人参

1. Tokyo Long. トウキヨウオナカ (Tokyo Onaga Ninjin) 東京大長人参
 2. Sapporo Giant. サッポロ (Sapporo Futo Ninjin) 札幌大人参
 3.

Cooking Burdock. ツボウ 芋蓴

1. Tokyo Long. タキノカワ (Takinogawa Gobo) 護之川芋蓴
 2. Oura. オーウ (Oura Gobo) 大浦芋蓴

Egg Plant. ナス 茄子

- Sennari. センナリ (Tsuruboso Sennari Nasu) 蔓田茄子
 2. Japanese Coal Black. (Shinkuro Nasu) 黒茄子
 3. Tokyo Market. トウキヨウナス (Tokyo Mamehasu) 東京山茄子
 4. Kinchaku. キンチャクナス (Kinchaku Nasu) 巾着茄子
 5. Sadosara. サドハラナス (Sadosara Naga Nasu) 佐土奈茄子
 6. Chinese Long. シナセンジャクナス (Shina Senjaku Nasu) 支那三叉茄子

Bean. ササゲ 豆

1. Yard Long Bean. ジュロクササゲ (Juroku sasage) 十片红豆
 2. Sword Bean. サマメ (Nata Beme) 刀豆

Pot-sal. ハクサイ

1. Sakata's Market Pride. アロニ (Aroni Hakusai) 愛知白菜
 2. Cheffo. チェフ (Cheffo Hakusai) 芝菜
 3. Peking or Chihili. チキ (Peking) 北京白菜
 4. Chokurei. チョクレイ (Chokurei Hakusai) 直隸白菜
 5. Chosen. チョウセン (Chosen Hakusai) 朝鮮白菜
 6. Chinese White Heart. シン (Kashin Hakusai) 卷心白菜
 7. Savoy Leaved. サボイ (Chirimen Hakusai) 卷心白菜
 8. Shangtung. シャントウ (Santosai) 山東白菜

Mustard. カシナ 芥菜

1. Konatsuna. コナツナ 小松菜
 2. Bac-Toy. バクトイ 倭菜
 3. Japanese Bac-Toy. ニホトイ (Taina) 日本倭菜

- | | | | |
|----------------------------|----------|-------------------|-----------|
| 4. Cal-Toy. | カイトイ 春芥菜 | (Hiroshima Na) | 広島 春芥菜 |
| 5. Hiroshima. | ヒロシマナ | (Chirimen Takana) | チリメン 春芥菜 |
| 6. Shirimen, Savoy Leaved. | シリメン | (Murasaki Takana) | ムラサキ 春芥菜 |
| 7. Murasaki. | ムラサキ | (Mikawashina Na) | ミカワシナ 春芥菜 |
| 8. Mikawashina. | ミカワシナ | (Sui Kuki Na) | スイクキ 春芥菜 |
| 9. Kyoto. | スイクキナ | (Hokurashi Na) | ホクリシ 春芥菜 |
| 10. Hokurashi. | ハクリシ | (Sensuji Kyona) | センジュキ 春芥菜 |
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Japanese Swiss Chard. (Natsuna)

(Fudanso)

フダンソ 春芥菜

Mitsuba. (Japanese Parsley) フダンソ

(Mitsuba)

ミツバ 春芥菜

Chisha. (Japanese Lettuce) 4シナ

(Kaki Chisha)

カキ 春芥菜

Onion. 子ネ 葱

Rbenoser. サツホ・ロ子ネ

(Sapporo Tannegi) 札幌 葱

Japanese Green Onion, or Bunching Onion. 2ホ・子ネ 日本 葱

1. Tokyo Market. セレビ子ネ (Senju Negi) 4佐葱

2. Natsunegi (Summer Growing) (Natsu Negi) 夏葱

Shungiku. (Vegetable Chrysanthemum) (shungiku) ナツ子ネ

茼蒿

Koranzo. (Japanese Spinach) レコレギ

(Koranzo) 苣荬菜

Aralia Cordata. (Udo or salad plant) (Udo) 少ト 土老帰

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Description of Japanese Vegetables.

Japanese Cucumber.

キウリ 胡瓜

Hardiness and prolific bearing nature are the meritorious features of the Japanese varieties of Cucumber. They withstand drought, moisture, and attack of fungoid disease to a remarkable degree, while some varieties have the nature to bear fruit on every joint of the main vine from 4 to 5 leaves upward.

Although they can be grown on almost any type of soil, well drained sandy loam, rich in humus is best. The best results are obtained in a location which is sheltered from cold wind, and well drained but not too dry, as is always the case with cucumis family.

Almost all varieties are sown in brisk hot beds in early spring, being transplanted once or twice to a mild hot bed, they are then planted out after all danger of frost is over. They are planted in rows three to four feet apart and one foot between each plant. Each vine is trained to a stake 6 to 7 feet high. They can also be sown directly in the field when the frost is over, in hills 1½ feet apart and 4 feet between rows. Four or five seeds are sown per hill, afterwards being thinned to one plant.

An average of from 12,000 to 14,000 plants can be planted per acre. About 1 pound of seed is required per acre when sown in hot bed, and 4 pounds when sown in the field. This will naturally vary according to variety and method of sowing, though usually more seed is required for early varieties as they can be planted closer.

About 25,000 to 50,000 lbs. per acre is a normal crop for many Japanese cucumbers.

The Japanese varieties of cucumber are very excellent for pickling and for salad, as they are crisp and have a very fine flavour, they are also very good when cooked.

1. Kanazawa. カナザワ 金澤

The fruit is well shaped and about 8 to 9 inches long and from 1 to 1½ inches in diameter, the fruit is dark green and is covered with spines, while the upper one-third is dark green. The fruit is very hardy and withstands cool climate. Bears fruit on every joint of main vine from 6 to 7 leaves upward. A very prolific mid-season variety.

2. Kariha. カリハ 刈葉

An early and hardy, disease resisting variety. The fruit of which is dark green and slender with a few brown spines,

Geographical Distribution of *Leptocarpus*

Leptocarpus *Leptocarpus* # 47

Leptocarpus is a small, creeping plant with small, round, green leaves. It is found in a variety of habitats, including wetlands, swamps, and along the edges of lakes and rivers. It is a common plant in the coastal regions of the Pacific Northwest.

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Leptocarpus *Leptocarpus* # 47

Leptocarpus is a small, creeping plant with small, round, green leaves. It is found in a variety of habitats, including wetlands, swamps, and along the edges of lakes and rivers. It is a common plant in the coastal regions of the Pacific Northwest.

it is about 7 to 8 inches long and 1 inch in diameter. This variety does not throw laterals, but is very prolific and bears fruit on every joint of the main vine from 3 to 4 leaves upward. Two fruits are often produced on one joint.

3. Tokyo Market. マジヤ 馬込

An extra early and prolific variety. The fruit is a whitish green, the upper part being green with brown spines, and is about 7 inches long and $1\frac{1}{2}$ inches in diameter, but becomes nearly 1 foot long when full grown. The fruit is crisp and of a fine flavour. An excellent market variety and a good forer.

4. Green giant. オホアオキウ 大青 大月向

A rather late, but vigorous grower. The fruit is large, about 8 inches long and 2 inches in diameter. Green color with yellowish spines. Flesh thick and good for cooking purposes.

5. Chinese Long. レナレウ 支那 三叉 大月向

A very fine cucumber of Chinese origin. A very hardy and vigorous grower, but late. The fruit is long and often exceed $1\frac{1}{2}$ lbs. in weight. Slender at the neck and a little thicker at the base, with very few yellowish spines. Excellent for cooking.

Japanese Cucumber Melon. レウウ 三叉 大月向

An interesting vine plant which is apparently derived from the cucumber, and produces large smooth skinned fruits of peculiar flavor, very much appreciated for pickling and for salad purposes.

Any soil on which the cucumber can be grown is suited for this vegetable.

Seed is started in late spring in bed or sown in the field in early summer. Two feet is needed between plants and from 5 to 6 feet between the rows. Stakes are not used. The main vine is pinched at 5 to 6 leaves as fruit set on laterals and sublaterals.

From $\frac{1}{2}$ to $\frac{3}{4}$ pound of seed is needed for an acre.

In order to secure a good crop they must be liberally fertilized with fertilizers rich in phosphate and potash, they must also be cultivated frequently.

From 13,000 to 15,000 per acre is a normal crop.

These melons are used extensively for salad and for pickling.

It is about 7 to 8 inches long and 2 inches in diameter.
The variety does not grow laterally, but is very prolific
and bears fruit on every part of the main stem 2 to 3
inches apart. The fruit is often produced on one joint.

2. *Topo* variety. 5-7 Y. 5 N.

As before noted, the variety is a
little green, the upper part being green and lower
part is about 7 inches long and 2 inches in diameter. The
fruit is about 1 foot long when fully grown. The fruit is
very hard and of a fine flavor, an excellent variety
and a good keeper.

3. *Green* variety. 4-5 Y. 4 N. 4 Y. 4 N.

A variety like the previous variety, but fruit is larger,
about 8 inches long and 3 inches in diameter. Fruit color
also yellowish green. Fruit does not grow for several
inches.

4. *Yellow* variety. 1-2 Y. 1 N. 1 Y. 1 N.

A very fine specimen of Chinese variety. A very early and
vigorous grower, but late. The fruit is long and thin, about
12 in. in length. It is as yellow as the rest and is a little
at the base, also very few yellowish spots. It is a
good variety.

5. *Yellow* variety. 1-2 Y. 1 N. 1 Y. 1 N.

An interesting variety which is a specimen of
from the collection, and contains large amount of
of yellowish flavor, very much resembling the yellow
for which it is named.

The soil on which the specimen was grown is a light
this variety.

It is named in honor of the collector of the plant, and
is very early. The fruit is long and thin, about 12 in.
It is a very early variety, and is a little yellowish
also is named as a specimen of the plant which was
collected.

From 2 to 3 inches of soil is needed for each plant.

In order to secure a good crop, the plants should be
planted with 12 inches of soil in between the plants.
The soil also is yellowish.

From 12,000 to 15,000 per acre is a good yield.

From which the above specimens were taken and for
analysis.

1. Tokyo Early. ^{しほウリ}ワセマナウ 早も甜瓜 向

A good market variety, early and prolific. The fruit is narrow at the neck and thicker at the base and are a light green color. They are from 6 to 7 inches long and 3 inches in diameter.

2. Tokyo Giant. トウキヨウシロウ 東京甜瓜 向

A mid-season market variety with large fruit of about 1 foot long and from 4 to 5 inches in diameter, weighing about 3 pounds. Cylindrical in form, light green color with slight stripes which change to almost white when ripe. Crisp and of fine flavor.

Japanese Canteloupe. マクワウリ 天瓜 向

A vine plant resembling melon or canteloupe and easily cultured. Best suited to warm, well drained soils of medium to heavy loam.

Seed is generally sown direct in the field in late spring or early summer when the ground is well warmed up.

The quantity of seed required for an acre will greatly vary according to the variety used, but will average between 3 to 5 pounds.

Good feeding is necessary and periodical pinching is essential as the fruit is generally produced on sub-laterals.

3,000 to 5,000 fruit from an acre is a normal crop.

1. Hoshi Makuwa. ナレマクワ 梨天瓜 向

Strong mid-season variety with egg shaped fruit of yellowish-white color, from 6 to 8 inches long and 3 inches in diameter. Extremely sweet and of fine flavor. Probably the best market variety grown.

2. Kin Makuwa. キレマクワ 金天瓜 向

An early and prolific variety with oblong golden yellow fruit which have slight ribs. Fine net appears on the skin when well ripe. Fresh greenish white, and very sweet.

3. Gin Makuwa. キレマクワ 銀天瓜 向

A mid-season prolific variety with oblong whitish skinned fruit with light green stripes. Flesh is green near the skin and white toward the center. Juicy and sweet.

4. Natsune Makuwa. ナツメマクワ 素天瓜 向

A small, but very prolific variety. Fruit is yellow and

1. *Phlox paniculata* L. var. *grandis* (L.) Murr.

A good example of the variety, showing the characteristic color of the flowers and the shape of the leaves. The plant is a bushy perennial, growing to a height of 2 to 3 feet.

2. *Phlox paniculata* L. var. *subulnifolia* (L.) Murr.

A good example of the variety, showing the characteristic color of the flowers and the shape of the leaves. The plant is a bushy perennial, growing to a height of 2 to 3 feet.

3. *Phlox paniculata* L. var. *subulnifolia* (L.) Murr.

A good example of the variety, showing the characteristic color of the flowers and the shape of the leaves. The plant is a bushy perennial, growing to a height of 2 to 3 feet.

4. *Phlox paniculata* L. var. *subulnifolia* (L.) Murr.

A good example of the variety, showing the characteristic color of the flowers and the shape of the leaves. The plant is a bushy perennial, growing to a height of 2 to 3 feet.

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A good example of the variety, showing the characteristic color of the flowers and the shape of the leaves. The plant is a bushy perennial, growing to a height of 2 to 3 feet.

9. *Phlox paniculata* L. var. *subulnifolia* (L.) Murr.

A good example of the variety, showing the characteristic color of the flowers and the shape of the leaves. The plant is a bushy perennial, growing to a height of 2 to 3 feet.

egg shaped, about 4 inches long and 2 inches in diameter, weighing about $\frac{1}{2}$ pound. Flesh yellowish white, very sweet, and has a fine flavor. 15,000 to 17,000 pounds of fruit can be expected from an acre.

Japanese watermelon. スイカ 西向

The Japanese varieties of watermelon are practically the same in character and habit as the foreign varieties. The same can be said as to the method of culture used.

1. Japanese Sweet. ヤマト 大和 西向

A very early and hardy variety, the fruit of which is globular and weighs from 6 to 10 pounds. The skin is light green mottled with darker green. The flesh is scarlet with a very thin rind, juicy and extremely sweet. Small brown seed. Very prolific and an excellent shipper.

Japanese squash. トウナス 陣 西向

The Japanese squash which belong to the family of Cucurbita moschata, though somewhat tender in constitution, are very much sweeter and finer tasting than any other variety of squash. Any soil on which ordinary squash can be grown will do for this variety. Too rich soil will deteriorate the taste although the crop will be greater.

Seed is sown in bed in the early spring or in the field in late spring, in hills 4 to 5 feet by 5 to 6 feet.

Japanese squash is not only excellent for pie, but is valuable for cooking in many other ways like other summer squash.

20,000 from an acre is a normal crop.

1. Yokohama. キウガ 菊座 西向

A good market variety, vigorous and productive. The fruit is large, flattened and ribbed weighing 5 to 10 pounds. Reddish brown color when ripe. The flesh is yellow and thick, and of a fine taste. It keeps very well and it's taste actually improves when kept well into the winter.

2. Tokyo Market. ヨウメ 塙 西向

An early and very prolific variety, flat and rather small and ribbed, weighing 3 to 4 pounds. Reddish brown when ripe and has small knobs all over the skin. The flesh is bright yellow and firm. This variety is exceptionally sweet. A variety of special merit.

3. Early Black-skinned. ワビクワカキ 早生黒皮 西向

An early (extra) and prolific variety. The fruit is very

small and ribbed, weighing only 1 pound, and is rather smooth. Has an excellent taste when quite young. Good for forcing.

4. Wakanatsu. アマガリ 甘栗南瓜

A mid-season variety. The fruit is small and globular, slightly pointed at base and without ribs. Reddish brown color, but fruit of deep green speckled with red is often produced. The flesh is thick and reddish yellow, tender and very sweet.

5. Kyoto. サイユウ 西京南瓜

A large, late squash of gourd shape, elongated, like a bottle, and strangled at the middle, ribbed, and has knobs all over the skin, weighs over 5 to 10 pounds. Reddish brown color. The flesh is reddish yellow and very good.

6. Chinese Noodle marrow. キンレン 金糸南瓜

This is entirely different from the preceding varieties, belonging to the Cucurbita pepo family and closely allied to vegetable marrow. A very vigorous and productive plant. The fruit of which is oblong, about 8 inches long and 5 inches in diameter, and weighing usually about 1 pound. The skin is orange yellow, the flesh yellowish white and fibrous.

To cook, cut the fruit in half, crosswise, boil 10 or 15 minutes and rub out the fibrous flesh which is just like vermicelli. This has no special taste but is very good for stew, soup, or any other cooking purposes.

Oriental Vegetable Melon. トウユウハサイウリ 東洋野瓜

Togan. トウカシ 冬瓜

This may be described as a cooking watermelon. It is very hardy and productive, but late maturing. The fruit is large and greenish skinned. It keeps very well and can be preserved for winter use. Has whitish flesh, no special taste but is valuable for stew, soup, and other cooking purposes.

The seed is sown in open ground in late spring in hills 3 feet apart, and in rows 6 feet apart. From two to three pounds of seed will sow an acre.

Late Giant. オウトウカシ 大冬瓜

A representative market variety of Togan, late and big fruited, measuring about 1 foot 4 inches long and 1 foot in diameter. Cylindrical in form. The flesh is white and of good texture.

Yugao, or Butter Bean Gourds. エウカホ 蒟蒻

Though belonging to Cucurbita Lagenaria family, it is closely allied to vegetable marrow. The habit and culture is similar to other gourds. The Plants are very vigorous and cover a wide space of ground. Any site or soil suited for marrow and squash is also good for this crop.

Seed is planted in hills in open ground, the long variety which is less vigorous, is planted 3 feet by 3 feet, while the round variety is planted 9 feet by 9 feet.

When young the fruit has an excellent marrow taste, and the flavor of French beans when cooked. The flesh of the larger fruits is sliced into long strings and is dried in the sun. This can be preserved for a considerable time. This is called Kwampyo, and is very convenient as it can be cooked at any time after soaking in water a few hours.

20,000 pounds from an acre is a normal crop.

1. Long Yugao. ナカエウガオ 長扁蒲

The fruit grows to from 2 to 3 feet long and from 6 to 7 inches in diameter. Light green color, flesh white, very productive.

2. Round Yugao. マンエウガオ 丸扁蒲

The fruit is globular or egg shaped, is large sized, measuring 15 to 20 inches in diameter, and often weighs over 30 pounds. This is a very vigorous and productive plant, especially fitted to the manufacture of Kwampyo. The dried shell of the matured fruit of this variety is very hard and light, and is convenient for household use as receptacles.

Japanese Radish.

ダイコン 日本大根

Unlike ordinary radishes, Japanese varieties grow to a great length and size and most of them are treated as biennials.

The Japanese radish can be grown in almost any climate, but a deep rich and moist soil is best suited for this culture.

The seed is sown in rows or drills 2 to 3 feet apart. From 12 to 20 pounds of seed is required for an acre.

1. Sakurajima Giant. サクラジマ 桜島大根

This is the most gigantic radish now in cultivation. It is late, but grows to an immense size, often weighing over 70 pounds! At Sakurajima, the original home of this monster radish, where climatic conditions and the type of soil is best suited for this variety of radish, monstrous roots of very fine quality can be obtained. Sakurajima is a volcanic island situated to the south of Japan, and naturally it is very warm. Snow is hardly ever seen during winter and in the summer it is very hot there, exceeding 90 degrees.

The flesh is white and brittle and has a fine flavor. Very good for cooking purposes and also for feeding cattle.

Cultivation practised at Sakurajima.

Soil. A deep rich sandy loam is most suitable for the cultivation of a good crop of Sakurajima Radish. Deep trenching is essential.

Sowing. Seed is sown between Sept. 5th and 15th in rows 5 feet apart and 2 feet 10 inches to 3 feet between plants. About 10 seed is dropped per hill.

Feeding. Liberal feeding is also an important feature in order to secure gigantic roots. Three or four times during the growing period liquid manure is put around the plants. Give often, but little at a time, is the rule.

Thinning. When true leaves appear, thin to 3 plants per hill, later when 4 or 5 leaves appear, thin to one. Good roots can be obtained from rather slender and weak looking plants having a reddish tint at the roots. Plants with too vigorous leaves, and short and white rooted plants, though healthy looking, do not produce gigantic roots.

Earthing up. After second thinning and feeding, earth up soil slightly at the roots, then again after the third feeding.

2. Shogoin. ショウブイロ 醒護院大根

Large and globular, and very prolific variety. Roots grow to a size of about 1 foot in length and about 7 to 8 inches in diameter, weighing 4 to 5 pounds. Color, white. Flesh, crisp and excellent for cooking.

50,000 lbs. from an acre is a normal crop.

3. Horima. 子リマ 子馬大根

An important market variety, very long and narrow at the neck and tip, measuring over 2 feet long and 3 inches in diameter, usually weighing about 3½ pounds. The flesh is a brilliant white, brittle and a good keeper. Excellent for cooking.

4. Miyashige. ミヤシゲ 太根 官童大根

A very fine variety which grows about 15 inches long and about 3 inches in diameter, weighing about 4 pounds. Cylindrical in form, white color and greenish at the neck. The flesh is tender, brittle and sweet. This variety is best suited to rather heavy soil. The leaves are green and have a tendency to grow upright.

5. Mino Early. ミノワレ 美濃早大根

An early maturing long variety, cylindrical in form

measuring about 2 feet long and 3 inches in diameter, usually weighing about 5 pounds. Leaves dark green, and upright. Very good for cooking.

6. All season. トキナシ 時蕪大根

The most useful variety for all season culture, especially adapted for summer culture. Color white, flesh brittle and firm and of a fine flavor. Roots about 1 foot long and from 1 to 2 inches in diameter. The leaves are dark green and stand upright.

7. Summer Radish. ナツダイコン 夏大根

Best variety for summer culture. Roots about 2 feet long and 3 inches in diameter, weight about 3 pounds. Conical in shape. Color white, flesh brittle and good for cooking. Leaves are dark green and upright. When sown in early spring, they can be harvested in late summer or in early autumn.

Turnip. カブ 蕪

Japanese turnips are hardy and can withstand bad weather and disease pretty well. Any soil that is good for the radish is also good for Japanese turnip, although a good crop may be expected on rich sandy loam.

Seed is sown in rows and drills $1\frac{1}{2}$ to $2\frac{1}{2}$ feet apart, and 6 inches to 2 feet between plants, according to the variety. 3 to 6 pounds of seed will sow an acre. 23,000 to 33,000 pounds per acre is a normal crop.

Japanese turnips are excellent for cooking, while some varieties are valuable for cattle feed.

1. Sakata's Improved Foliate Turnip. ショウブイロ 聖後院蕪

This is the largest turnip we have in Japan. The skin is pure white under the earth but turns to green when exposed to the sun. When fully developed the roots measure about 6 to 7 inches in diameter and 4 inches in depth. The foliage is narrow and grows straight upward reaching the height of 20 inches or more. Around Tokyo we plant them in late August and harvest the roots in January the following year. In cooler localities the farmers plant them in late July. We eat the roots cooked as well as preserved, but city people do not eat the foliage.

2. Nagoya. オワリ 尾張蕪

A large white variety of very fine quality, globular and a little pointed at the tip, measuring about 5 inches diameter and 4 inches in depth. Flesh is white, solid and of a very fine flavor. The leaves are long, about $1\frac{1}{2}$ feet, and stand upright.

3. Summer Turnip. ナツカブ 夏蕪

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The roots are round and flat and about 4 inches in diameter and $2\frac{1}{2}$ inches deep, white and fine flavored. A good variety for summer crop.

4. All season. トキナレ 時無

A rather small but an excellent variety for all season. It is round and flat shaped, 4 inches in diameter and 2 inches deep. Flesh white and moderately firm. Leaves short and wide, about 10 inches long and $3\frac{1}{2}$ inches wide, and are serrated.

5. Tokyo market. コカフ 小蕪

Small, but an excellent turnip largely grown around Tokyo. The roots are white and measure about $1\frac{1}{2}$ inches in diameter and 1 inch deep, but when full grown reach 3 inches or over. The flesh is solid but tender and very sweet.

6. Iyo Crimson. イヨニカフ 伊予赤蕪

A mid-season purplish scarlet variety. Roots 3 to 4 inches in diameter and $1\frac{1}{2}$ inches in depth, weighing about a quarter of a pound. Flesh reddish white. Leaves about 10 inches long and 2 inches wide. Serrated and standing upright.

7. Green Turnip. アオカフ 喜蕪

Green Turnip. アオカフ 喜蕪

Roots about 4 to 5 inches in diameter and 3 to 4 inches deep. Color is green but whitish at the tip. Flesh white and firm. Leaves dark green.

Carrot. ズレヰ人參

The Japanese carrot loves deep well trenched sandy loam, which is adequately irrigated. The general culture is the same as ordinary carrot, though the longer variety requires more time in which to mature than the shorter varieties.

1. Tokyo Long. トウキヨウオウナカ 東京大長人參

Very long and productive variety, about 2 $\frac{1}{2}$ feet long and 2 inches in diameter. Extremely sweet and delicious. The skin is smooth and orange red in color and almost coreless. A leading market variety.

2. Sapporo Giant. サフホロ 札幌大長人參

A quick growing variety which grows about 8 inches long and 2 inches in diameter. Conical in shape. Flesh is a orange red throughout and is very sweet.

Cooking purdock. フアウ 午蔘

A biennial plant which resembles Salicify in appearance

as to its roots. The flesh is white, grained and crisp, and has a very good flavor, somewhat resembling that of salicify. Valuable for soup, stew, and other style of cooking.

The general culture is about the same as salicify. A deep well drained sandy loam is best. The seed is sown in August or September in drills or dots about 2 feet apart, thinning to stand 1 foot apart afterward and is harvested in June and July. Spring sowing can be made also in March or April just after the frost is over which may be harvested in October or November.

13,000 to 20,000 pounds per acre is a normal crop. About 10 pounds of seed will sow an acre.

1. Tokyo Long. チキナワ 滝之川芋

Very slender and conical shaped variety, 3 to 4 feet long and $1\frac{1}{2}$ inches in diameter. The skin is light brown, flesh white and of very fine flavor. An excellent market variety and a heavy cropper.

2. Oura. オーウ 大浦芋

Unlike the preceding variety, the roots grow like a radish in shape, about 15 inches long and 4 inches in diameter weighing about 1 $\frac{1}{2}$ pounds. Skin yellowish brown, flesh white, tender and of fine flavor. A popular market variety.

Egg Plant. ナス 茄子

Rich sandy loam on warm well drained sunny position is best suited for Egg Plant. The seed is started in brisk hot bed in early spring, transplanting once or twice in mild hot bed before planting out. The Japanese varieties can be planted closer than foreign varieties. 5,000 to 10,000 plants can be planted in an acre. Early varieties can be planted much closer, 1 to 2 feet between plants and 2 $\frac{1}{2}$ to 4 feet between rows are usual distance. 13,000 to 14,000 pounds to an acre is a normal yield. 1 $\frac{1}{2}$ to 5 pounds of seed may be required according to variety used.

The Japanese egg plant can be used for the same purpose as foreign varieties though the texture and flavor are far superior to them.

I. semari. セマリ 4球茄子

An exceptional prolific variety. The plants are slender and branching. Fruit is rather small and egg shaped, color purplish black. A good forcing variety.

2. Japanese Coal Black. シロクロナス 黒茄子

A very prolific mid-season variety. Fruit is medium sized rather elongated in form, measuring about 4 inches long

and 2½ inches in diameter, color almost black. Very thin skinned, flesh tender with good flavor with very few seeds.

3. Tokyo Market. トウモロコシナス 東京山茄子

A very vigorous and most productive variety, medium sized and egg shaped. color dark purple, thin skinned and excellent for cooking. A very good and prolific market variety.

4. Kinchaku. キンチャクナス 巾着茄子

A vigorous growing and prolific mid-season variety. Fruit purplish black and round-flat and a little irregular in shape. Excellent for cooking.

5. Salovara. サロワラナス 佐土原茄子

A prolific long fruited variety. Fruit about 5 inches to 6 inches long, purple skinned and of good quality. Plant hardy and long bearing.

Chinese Long. シナサレビナス 支那三片茄子

A curious variety, fruit long, grow as long as 20 to 25 inches and diameter not exceeding 1 to 1½ inches. deep purple in color and of very fine quality. thin skinned and having only few seeds. Plant hardy and of easy culture. Excellent for cooking.

Bean. ササゲ 豆 豆

Give sunny position of medium to heavy loam is suitable for the Japanese bean. Plant in drills 18 to 30 inches apart, and 10 to 18 inches between plants.

1. Yard Bean. ヤードナス ササゲ 十片豆

A good table bean of very long pod over 10 inches and only ½ to ¾ inch wide. seed reddish brown. The pod is crisp, tender, and of very fine flavor like asparagus, hence the name of Asparagus Bean. Excellent for salad and other cooking purposes.

2. Sword Bean. ナギナサ ナ豆

A vigorous climbing bean of rapid growth. pods measure 8 to 10 inches long and 1½ to 2 inches wide. Young pods are sliced and cooked, also good for salad or pickles.

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CHINESE CABBAGE.

ハ / 中 / 人 菜

According to Mr. Bailey the botanical name is *Brassica* *Caapestris* Pet-sai, thus the common name is Pet-sai Cabbage.

The wild sort of *Brassica* *Caapestris* is found in Asiatic Russia and China, and many think that the present Chinese Cabbage was improved from this. In China this cabbage plays an important part among green vegetables.

This cabbage was introduced to Japan about 25 years ago, and the popularity has increased ever since, until today it is cultivated more than any other vegetable of its nature. The same is true in China.

Because of the demand and importance of this cabbage it's quality has been greatly improved. While the difficulties of securing pure strains are very great the high prices obtainable for this seed is quite tempting to plant breeders; therefore, new and better varieties are brought out each year. We consider that the Japanese grown Chinese cabbage seed is better than that produced in it's native country.

According to food specialists the salts contained in Chinese cabbage serve to purify the blood.

In this country, Chinese cabbage is used as food just like the ordinary cabbage, but due to the heavier harvest and the easiness of cultivation, the acreage is much more extensive than ordinary cabbage.

THE GREAT ADVANTAGE OVER CABBAGE.

The great advantage of Chinese cabbage is it's short season of growth and that its yield as a green vegetable, is equal to or greater than that of ordinary cabbage.

In this country, cabbage is planted in September, and is harvested in either June or July, while the Chinese cabbage is planted in late August or early September and is ready for harvest in November. The time required to grow Chinese cabbage to maturity as a green vegetable is about 100 days while that for ordinary cabbage is nearly 300 days.

For such a short space of time the farmers get, if properly harvested, about 40,000 pounds of pet-sai heads. This yield corresponds with the Late Cabbage yield in this country, and doubles the yield of Early Cabbage.

If these yields are too great in comparison to those of the states, it is probably due to the intensive farming of this country (closer rows and closer planting in the rows) in comparison to that of yours.

CULTIVATION.

Around Tokyo this cabbage is planted either in late August or early September. About 2 or 2½ pounds of seed is used to the acre.

The seed is planted in rows 2½ feet apart, and later thinned so that the plants stand 1½ feet apart in the rows.

Cold weather is required to produce good heads, the seed usually being planted after August. They grow rapidly during the warm season and toward the cold season make heads which easily weigh 10 pounds.

They require a lot of water, as well as rich humus loam or heavy clay soil which will retain the moisture, this is especially true when they are growing rapidly and making heads.

In a warm climate or when grown on dry soil, they seldom make satisfactory heads, instead leaves grow up and the plant flowers.

The following conditions are necessary for the successful cultivation of Chinese cabbage: The weather must be fairly warm during the growing season, and somewhat cooler during the period when the heads are forming. The soil must be naturally moist or moisture must be added by means of irrigation. The soil must also be in good physical condition and well fertilized.

1. Sakata's Market Pride. アイサハサハ 慶知白菜

This is diverted from the chungtung type, but produces much more tender heads and is more easily cultivated.

The striking advantage of this type is that the plants head easier than most other varieties now in existence.

They are not so large as seen in other types such as Cheffo or Chokurei but when fully developed yield heads about 8 inches in diameter and 14 inches in length.

The leaves are light in color and their less fibrous leaves are much appreciated.

2. Cheffo. 4-7- 芝罘白菜

This is one of the largest Pet-sai cabbages, easily measuring 14 inches deep and 9 inches in diameter. They make solid heads.

This is one of the best, and most popular Pet-sai now under cultivation.

3. Peking or Chihili. 七ヶル 北京白菜

Very similar to Chokurei but smaller in size, makes torpedo shaped heads pointed at the top. While this type does not yield heavily it is more easily cultivated and comes

true to type more than the majority of other varieties.

This is not very large, but when carefully cultivated yield heads which measure 18 inches long and 4 inches in diameter.

4. Chokurei. 43541 直隸白菜

Originated from Chokurei district, China. When fully developed they measure about 18 inches long and 8 inches in diameter.

This is something like the peking type but much larger in size and somewhat looser near the top.

5. Chosen. 43542 朝鮮白菜

Originated in Korea. A large and tall growing loose headed variety, 2 feet high and weighing 5 pounds. Easy to cultivate and of fine quality.

6. Chinese White Heart. 43543 卷心白菜

A variety of Chinese origin. Tall and cylindrical in form and loose headed. About 20 inches tall and 6 inches in diameter at the head and from 4 to 5 inches at the base, usually weighing about 4 pounds. The outer leaves are green, and the heart pure white, a very fine quality and quite prolific.

7. Savoy Leaved. 43544 縮柄白菜

Though this variety does not form a head like other varieties, it is a very good market variety and valuable for cooking and for salad. The leaves are a yellowish green.

8. Shengtung. 43545 山東白菜

This variety differs entirely from other Pet-sai varieties, being rather like a Cos-lettuce in appearance. The thick leaves are very good used as a green. Excellent for soup and salad, also good for cooking with meat. The seed is sown in late summer or fall for winter greens, but if sown in early spring can be harvested in early summer. This variety is also valuable for poultry feed. For culture follow Pet-sai.

Mustard. 43546 芥菜

Any site and soil suitable for pet-sai is also good for Japanese mustard. It is very easily cultured and a heavy yielding crop. Makes an excellent green and is also good when cooked like spinach or beet leaves.

The seed may be sown at almost any time during the spring and summer.

1. Konatsuna. 43547 小松菜

There is also some from the vicinity of the station.

This is not very large, but very interesting. It is found in the same place as the other two, and is also in the same place.

1. *Commersonia* 10/10/10

Collected from the same place as the other two, and is also in the same place.

This is interesting. It is found in the same place as the other two, and is also in the same place.

2. *Commersonia* 10/10/10

Collected from the same place as the other two, and is also in the same place.

3. *Commersonia* 10/10/10

This variety is found in the same place as the other two, and is also in the same place.

4. *Commersonia* 10/10/10

Though this variety does not grow in the same place as the other two, it is also in the same place.

5. *Commersonia* 10/10/10

This variety is found in the same place as the other two, and is also in the same place.

6. *Commersonia* 10/10/10

This variety is found in the same place as the other two, and is also in the same place.

This variety is found in the same place as the other two, and is also in the same place.

7. *Commersonia* 10/10/10

It is not known from where this came from or how it came to be cultivated in this country, but it is extensively cultivated around Tokyo and takes the place of spinach.

This is related to the Rape or Turnip family but the foliage has been developed to its present condition through selection and breeding. It has a delicious mustard flavor and the leaves are much less fibrous than those of Rape or the Turnip. The writer thinks it is much more tasty and highly flavored than spinach.

Without doubt this will serve as an important green during the winter as well as the spring season.

Around Tokyo this variety of mustard is planted from late September to the middle of October and is harvested in early December, and sometimes before that time.

As this is very hardy it can be grown during the winter months to supply tender foliage for the table. It resembles spinach in numerous ways, and can be planted, cultivated and utilized in the same way as spinach.

They can be sown in the spring and can be harvested within from 40 to 60 days after they are planted. While they can be grown to a tall height, we harvest them at an early state as they are much more tender when young.

2. Bao-Toy. (Chinese white Mustard) *バウタイ* *白菜*

An excellent mustard of Chinese origin closely resembling Taina mustard. It has the fine flavor of the Chinese cabbage but with a little more of a suggestion of pungency of mustard.

The leaves make good greens and the outer stalks may be used either as a salad or cooked like chard. The heart is most excellent to be eaten raw, either as calery or with salad dressing, or as a plain salad. Anyone who tries it will praise its excellent flavor and its high quality.

If sown in early August heads will be ready for use at about the same time as Grand Rapid Lettuce.

The writer has a firm belief that this excellent mustard should meet with hearty welcome in the States.

3. Japanese Bao-Toy. (Japanese white Mustard) *バウタイ* *白菜*

This closely resembles the preceding variety in appearance and in flavor. It is less pungent than any other ordinary mustard and is very good when cooked like spinach or beet leaves. It makes a very good winter green. The leaves are smooth and fleshy with a long wide white stem which stands upright.

The seed is sown in late September in drills 2 feet apart and are thinned to stand 10 inches apart in the row.

This crop can be harvested from December on.

4. Cai-Toy. カイトイ 青苣菜

A Chinese variety of mustard, producing thick leaves of dark green color, with a delightful flavor. It grows to the height of 4 feet, the leaves measuring as much as 20 inches. It is cooked and served like spinach or beet leaves.

5. Hiroshima. ヒロシマナ 青島菜

A large fast growing mustard with broad leaves sometimes as much as 1 foot across and 2 feet in length with broad white petiole. A plant of this mustard often weighs as much as 8 pounds. It keeps well and is valuable for cooking.

6. Chirimen (savoy Leaved). チリメン 宿宿苣菜

An excellent new variety of Takana mustard. The leaves are very abundant, purplish green in color and of a fine savoy type, having an exceptionally fine flavor. For culture follow Takana.

7. Murasaki. ムラサキ 紫苣菜

A variety of mustard with purple savoy leaves which may be pulled off like kale.

8. Mikawashima. ミカワシマナ 三河島菜

A variety of mustard with large ovate leaves which are thin, smooth and light green in color. A valuable winter green as it keeps very well. Excellent when cooked.

The seed is sown in early autumn in drills 2 feet apart and is harvested during November and December.

9. Kyoto. キョウトナ 京菜

A variety of mustard resembling Komatsuna in appearance. It can be left in the field until February as it is very hardy and withstands cold very well. The leaves are smooth and ovate shaped and about 3½ inches wide and 1 foot long, with leaf stem. Good when cooked. For culture follow Komatsuna.

10. Hakarashina. ハカラシナ 葉苣菜

The original Japanese mustard belonging to the Brassica Cerna family. It withstands cold very well and is used as a winter crop. Has a sharp pungent flavor; very good for cooking. The seed is used to make mustard powder.

11. Sui Tsai. スイツァイ 4筋菜

May be well described as Japanese Endive. Leaves are very slender and dense, deeply cut-toothed. Valuable for greens and for cooking.

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2. 1111 1111 1111

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8. 1111 1111 1111

Japanese Swiss Chard (Hatsuna). フダレソウ 苣菜

An early strain resembling the English variety with abundant oval shaped leaves with leaf stem 4 inches wide and 1 foot long. Used similar to Swiss chard.

Mitsuba. (Japanese Parsley) ミツバ 鴨火芹

A perennial plant which throws long slender stems with three heart shaped leaves at ends. Has special flavor and is excellent for salad and for soup.

This seed should be sown thinly in drills in spring. Produces, when well earthed up, tender blanched stems. 12 to 13 pounds of seed will sow an acre.

Chicha. (Japanese Lettuce) チンチ 蔠苣

This is very much like Cos Lettuce or Kale in habit. Used for table and is also good for chicken food.

Very easily cultured. The seed can be sown at any time of the year in drills 1½ to 2 feet apart.

Onion (Ebenezzer) 子仲 葱

This fine Japanese variety of onion resembles yellow glove panvers in shape, but is superior in flavor and keeps very much better. The bulb is globe shaped, and when well grown measures from 3 to 4 inches in diameter, weighing 1½ pounds. The skin is light yellow and is very thin, the flesh is solid and a most delicious mild flavor.

The sets from this variety yield a larger tonnage than any other variety and will not easily run to seed. It is also hardy and disease resistant.

Japanese Green onion, or Bunching onion. 二ホ子仲 青葱

This bunching onion is said to be known for more than one thousand years. It is extensively used as a vegetable food in this country.

In Japan this onion is more generally used than ordinary varieties. It is used either raw or cooked, and by the Japanese is especially praised in the raw state. As a blanched onion sliced it is used very much more extensively here than the Bermuda onion is used in the United States. For eating raw the outside sheaths are removed and the inner portion only is eaten.

The writer thinks much more of this Bunching Onion than of the Bermuda onion as this is not so strong as the latter.

The seed is commonly planted in the spring and then is often transplanted. When grown to fair size, they are blanched in the

in the field just like celery plants, and are used from late fall until the flower stalks appear in the spring.

Very often they are planted in summer under similar cultivation and are used during the winter season.

Seed is sown in drills 25 inches apart. 5 to 6 pounds of seed will sow an acre. 8,000 to 8,500 pounds from an acre is a normal crop.

In view of the fact that this onion must be blanched with soil a loose mellow humus or deep friable sandy loam is required to obtain the best results. Bunching onions if not blanched are very tough and can not be eaten.

This Bunching onion is extensively used in the Chop-Suey houses in the United States and in most cases they are sliced thin and used for dressing. In our opinion this is the best way to eat them for they are too fibrous to be good if they are not sliced thin.

1. Tokyo Market. センブリ子母 4位葱

This is the best market variety grown around Tokyo. The length overall is 2 feet 8 inches if well grown. The white part of the stem measuring about 1 foot 2 inches and about 3/8 inch in diameter. Well blanched stems are of a very good flavor.

2. Natsunogi (Summer Growing). ナツ子母 夏葱

An important variety derived from the preceding strain, height 2 feet with 7 to 8 inches of white stem which is over 1/2 an inch in diameter. This is a very good quality onion and stands hot weather very well. Can be harvested throughout the summer.

Shunaku, (Vegetable chrysanthemum). シンナク 蔞葱

An important green belonging to the Chrysanthemum coronarium family, highly valued because of its aromatic flavor. Harvested when the plant is 4 to 5 inches high. It is cooked like spinach. Very easily cultured and does not require any special attention. It will grow on any type of soil.

Sow seed in drills 1 1/2 feet apart. Sow in succession with intervals of three weeks from early spring until autumn and this will ensure a continuous crop.

Horenso, (Japanese spinach). ホレンソウ 菠薐草

An easily grown prickly seeded oriental spinach. The leaves are thick and deeply serrated like dandelion leaves, they are very tender and delicious and can be cooked like any other variety of spinach. The seed is sown in drills in late autumn to secure a good crop of green in December or

January. It matures in about 45 or 50 days. 10 to 15 pounds of seed will sow an acre.

Aralia Cordata, (Udo or Saled Plant)

ウド 土老帰

A valuable Japanese vegetable which is green in bed, blanched and cut like asparagus. Udo stalks are tender, crisp, and have a delicious flavor which is excellent for salad, soup, or for any other style of cooking. The whole stem of Udo plant is edible. It grows to be two feet long if well grown.

The seed is sown in bed in early spring, transplanting into the permanent bed the following autumn, this bed should be trenched to a depth of 2 or 3 feet. shoots can be harvested the following spring. The bed will continue producing eight or ten years.

Thursday, June 20, 1929.

Left this morning at 9:48, en route for Okegawa Saitama-ken, Tokyo, Japan, to see, in that vicinity, the historic old Tamaza sakura flowering cherry tree. It was about 20 after 11 a. m. when we arrived there. We took a bus out to Ishido then walked about a mile or a little more to the small Tokoji Temple, at the side of which stands the largest cherry tree we have yet seen.

This tree, which is surrounded by monuments (as will be seen from the all around pictures made) is 40 to 45 feet in circumference a short distance from the ground. There are 7 independent trunks, the circumference of each is as follows: 27 $\frac{1}{2}$ ", 30 $\frac{1}{2}$ ", 154", 114", 27 $\frac{1}{2}$ ", 120" and 76".

The front large trunk on the right, facing the tree from in front of the temple, is 76", measured 5 feet above the ground. The trunk back of this on the right measured at 7 feet above the ground is 120". The back small trunk almost at the center-back measured 6 feet from the ground is 27 $\frac{1}{2}$ inches. The large trunk back and on the left, measured 6 feet above the ground, is 154". The small trunk, practically under the last large trunk noted, measured at 6' above the ground is 30 $\frac{1}{2}$ " and the small front trunk on the left, measured 6' above the ground, is 27 $\frac{1}{2}$ ".

In making these measurements we scared an owl from her nest of 3 eggs. There is a stone wall about the tree and on top of the stone wall posts and a chain, in front there are steps and a gate.

We made half a dozen pictures showing what we could of the tree from as many different positions, we also secured quite

a nice lot of the fruit which had fallen to the ground.

On cleaning this after returning to the laboratory more than half of it floated out in the washing, what we saved goes forward under #331.

We found here a plant of the edible honey-suckle, perhaps Lonicera edulus var. praeflora full of nice red fruit $3/8$ " across by $5/8$ " long. We secured the fruit and are sending it in under #332. We also made a picture of the plant. (See picture #43896) but on account of the background of green plants, it does not show up to advantage.

Just outside of the Temple grounds we saw a planting of bamboo which looked to be badly affected with witches broom, we collected herbarium specimen, they will go forward under #329.

Okegawa Saitama-ken, is central in an extensive sweet potato section. The variety is a selection from potatoes brought several hundred years ago from Kishu Island. It is a pink skin potato, said to be of good quality. It is known as the "Kawagoe Sweet Potato". This for the most part is a non-irrigated region, wheat, barley, sericulture, upland rice and water rice, where water is available, and sweet potatoes are the principal farm crops. Wheat and barley as a whole look awfully good and are being harvested and threshed.

Upon our return to headquarters we found a cablegram from Mr. Ryerson dated Washington June 17 and Tokyo 18th. We received it about 10:00 this morning. It read as follows:

ONLY ONE HUNDRED AND FIFTY MORE POSSIBLE

RYERSON

Thursday, June 20, 1929 (cont 2).

The exhibits and pictures made today follow:



櫻蒲ルタ見リヨ方遠 (櫻蒲戸石寶國)

View from in front, and a little to the south of the Temple and tree, showing among the trees on the left, the Temple and to the right the upper part of the old cherry tree.



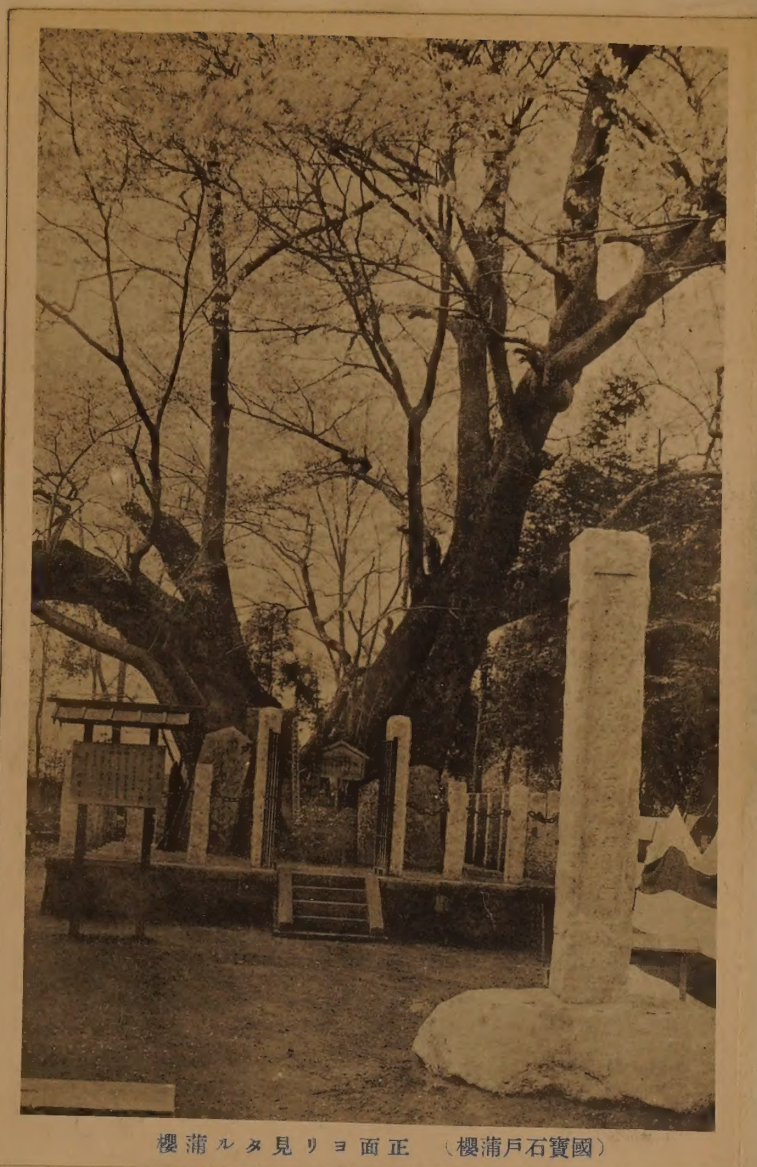
ス示ヲ狀ルタシ入埋ハ半ノ碑古ニ幹樹ノ側此 (櫻蒲戸石寶國)

A close up view of some of the monuments and inscriptions and just a little of the larger trunks.



塔之公頼範 (櫻蒲戸石寶國)

A close up of a stone monument in between two of the large trunks.



櫻蒲ルタ見リヨ面正 (櫻蒲戸石寶國)

A fairly close-up view of a goodly portion of the tree and stone and chain fence also at the right of the National monument stone.



Negative #43883.

Bundle of sweet potato slips at the station ready for shipment. Variety is "Kawagoe." Akegawa Saltan-ken, Tokyo, Japan.



Negative #43884.

Sweet potato slips the variety is known as "Kawagoe", wrapped with rice straw for shipment.



Negative #43885.

Vicinity of Akogawa, Saiten-ken, Tokyo, Japan. View showing wheat stubble rows which were planted to sweet potatoes before the wheat was cut away.



Negative #43886.

Vicinity of Akogawa Saiten-ken, Tokyo. Japanese Farmer and his wife threshing barley. See #43887.



Negative #43887.

View of the Japanese farmer and his wife threshing grain.

See #43886.



Negative #43888.

View of a portion of a small planting of burdock, which apparently is being grown for seed.

1625



Negative # 43889a.

A panoramic view in a very good farming area. In
the foreground are young mulberry plants.
See #43887b. Near Tokyo.

1626



Negative # 43877b.

a panoramic view in a farming area, quite similar
to # 43877a. In the foreground are young mulberry plants.



Negative #43889.

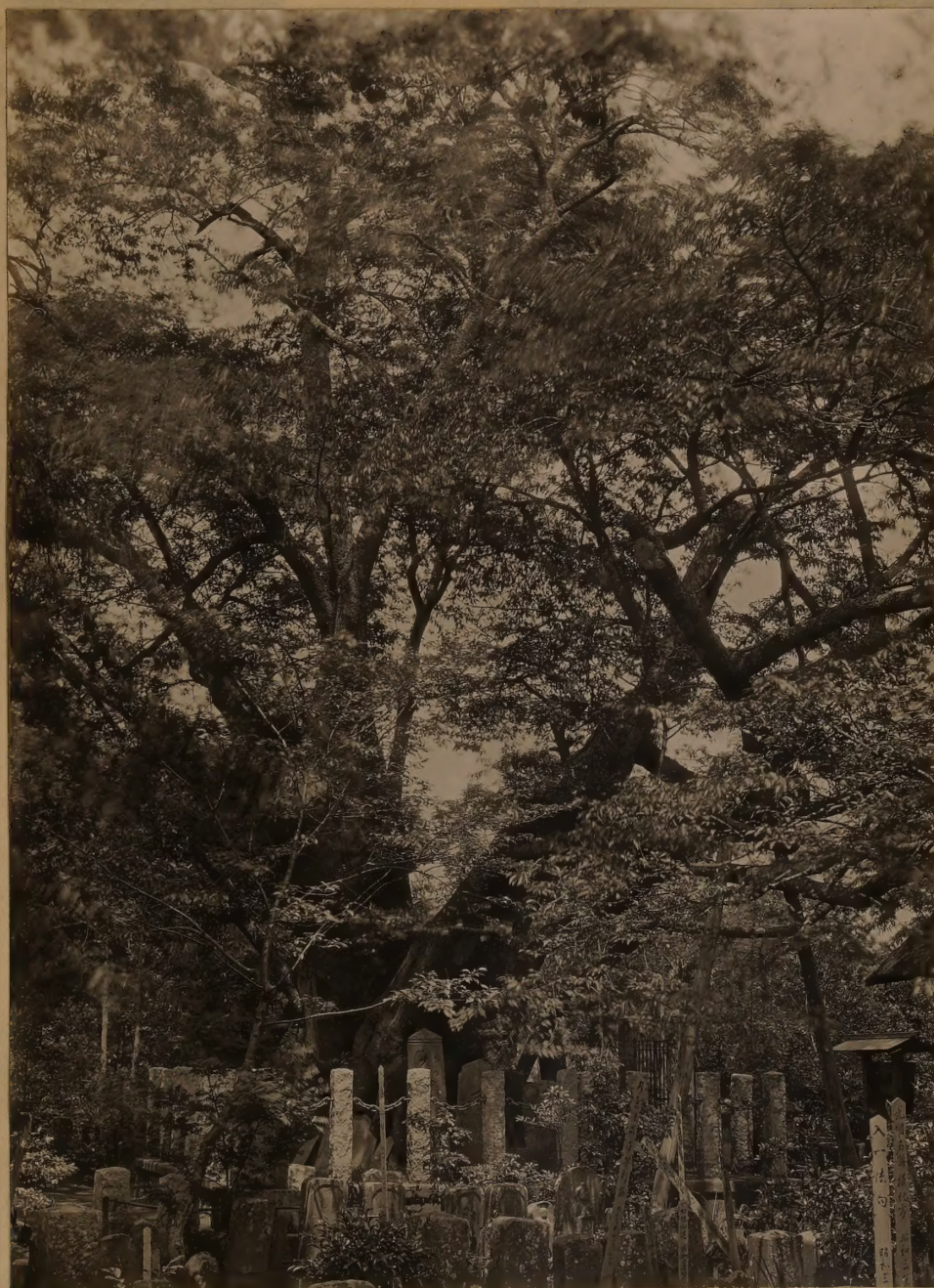
View of this old tree from a position to the N. W. of the tree, at the extreme corner of the small Temple grounds.

This tree at the ground is about 13 feet through 40 or 45 feet in circumference. Seed sent in under #331.



Negative #43890.

Taken from a position to the west or nearly so, with Mr. Suyetake sitting on the stone foundation or wall about the tree. see #43889-91-92-93-94 and 95.



Negative #43891.

View from a position to the S. W. at the extreme corner of
the Temple compound in that direction. Tokoji Temple.

Negative #43892.

This view is from a position a little, or almost to the west but a little south of west and rather nearby. Tokoji Temple.





Negative #43893.

View from a position practically due west, at least on the back side. Mr. Buyetake standing to the north side of the tree. Tokoji Temple, Ishido Kitaadashi gun, Saltama-ken, Japan.

Negative #43894.

A view from the east entrance to the Temple, just a portion of the Temple showing on the extreme left, at the extreme right is the National Monument tablet. To the right of the entrance gate to the tree plot Mr. Suyetake is standing on the stone wall around the tree.





Negative #43895.

Taken from a position to the S. E. showing a portion of the Temple and the top of the old cherry tree over the top of the Temple building.



Negative #43896.

This boxed plant was full of fruit which we secured from the old man who is in care of the Temple. It is being sent in under #332. The fruit is bright red and $3/8$ " across and $5/8$ " long, sweet and good, very juicy.

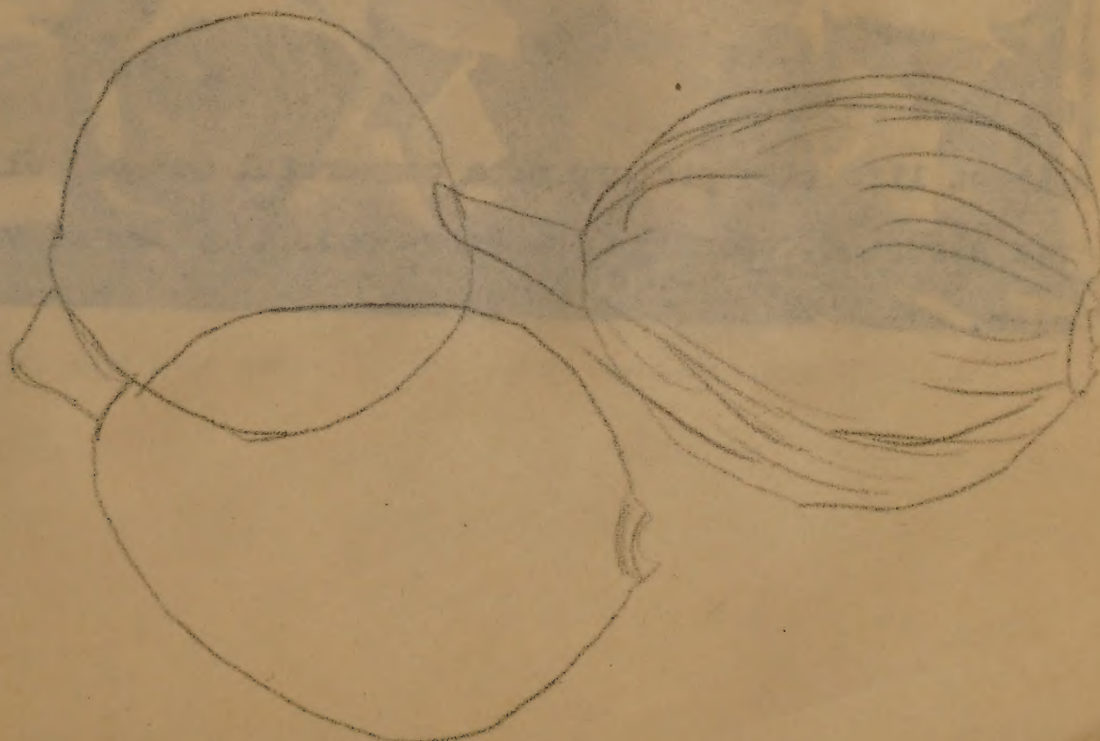
Friday, June 21, 1929.

Light rain this morning, and cloudy all day, cool and pleasant.

On the way to the office this morning we secured a box of creamy white, blush red cherries, perhaps Gov. Wood, and a box of 20 loquats, probably Tanaka.

We photographed these two fruits in the original packages and in combination, also made a picture of the loquats in a bamboo basket and a life size picture of the whole and sectional fruit which measured 2 to 2 1/8 inches across and 2 1/2 to 2 3/4 inches in length. They were very juicy and nice. We feel sure that fruit like those we bought this morning at ¥1.00 per box of 20, each wrapped separately in soft white paper, would take in the States.

We also jacketed the pictures made yesterday and wrote up our collections and herbarium specimen. Such of the pictures as are worth while follow.



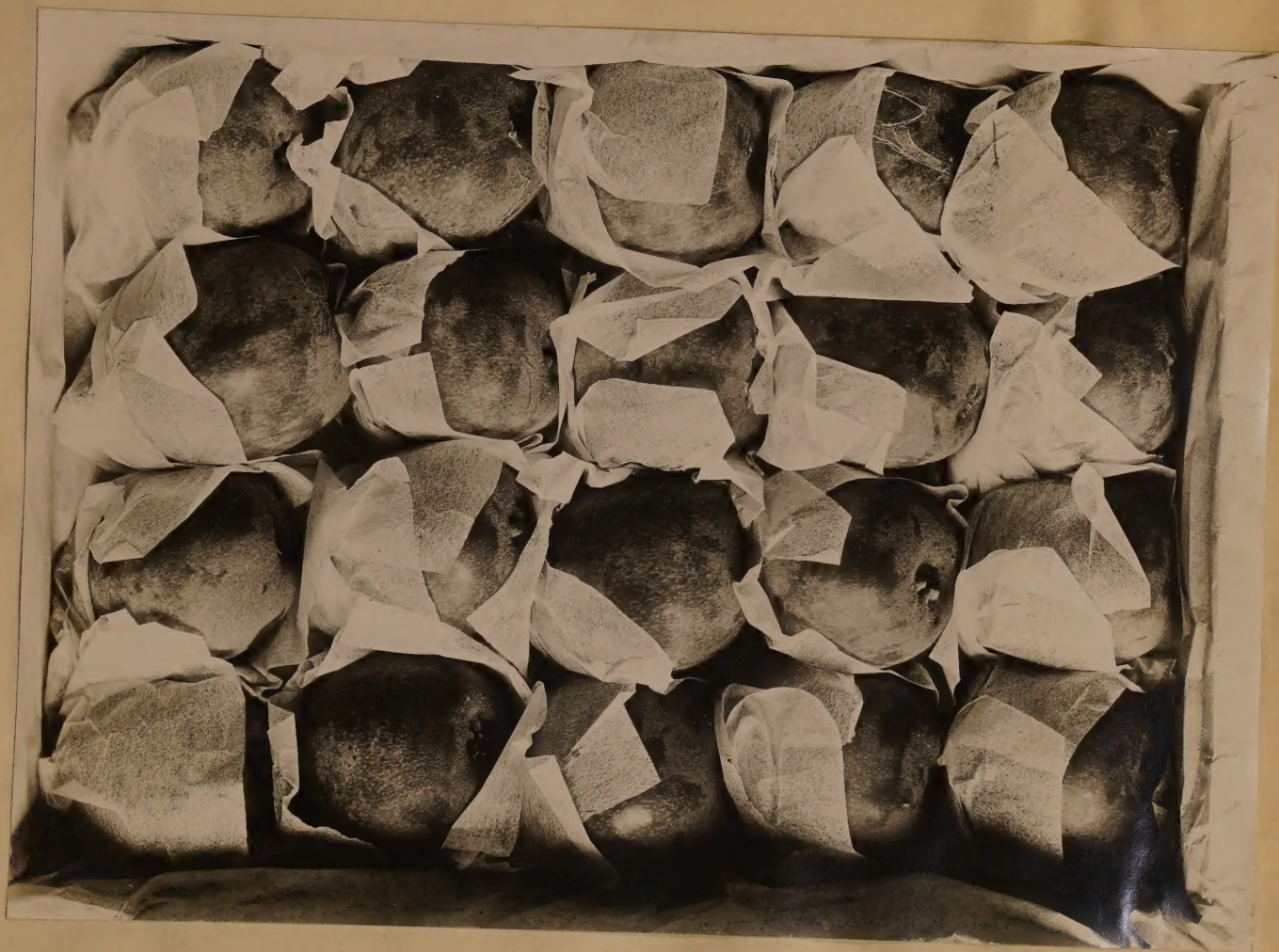


Negative #43897.

Almost life size picture of a commercial box of yellowish red cherries. Perhaps Governor Wood, they are of very good size.

Negative #43898.

Picture about half life size showing the original package of loquats each wrapped in soft white paper. The price of this box of fruit was Yen 1.00. The box measures 3" deep x 8" wide and 12" long.





Negative # 43899.

A life size picture of whole and sectioned fruit taken from the box shown in picture #43898. Common name is loquat.



Negative #43900.

A fairly close up picture of Loquats in a bamboo basket with a cluster of three and a bamboo knife on the outside. The loquats are the same as the ones photographed in the box.

Negative #43901.

A close up picture of the original box of cherries and the loquats in and out of a small bamboo basket with a bamboo knife beside the basket.



Saturday, June 22, 1929.

Went to the office early this morning and jacketed the pictures made yesterday, also wrote a letter to Mr. Harold S. Ryerson about the motion picture film forwarded to him yesterday by parcel post. In addition wrote several official letters.

About 11:00 a. m. we went to Meiji shrine to see the water lilies and Japanese iris. We understand that the Imperial Garden at this shrine is the second time these gardens have been opened to the public.

On arriving at headquarters at the shrine we found that today was what might be called a private opening or for invited guests only. However, we were given permission to go through and make pictures in the garden.

The water lily display is really very fine and the iris plantings which extend for quite a long distance (perhaps several thousand yards) up a rather narrow winding well wooded stream. It is a very beautiful setting for a garden of this kind. The plants are in full bloom and present a beautiful and fascinating picture. The colors are primarily purple, white, lavender and numerous shades and combinations of these colors.

We do not recall seeing such a display of iris any place in the United States which compare with what we saw today. In fact we do not recall ever having seen any considerable number of Japanese or water iris. The flowers of some of those we saw today measure fully 8 to 10 inches across.

Such of the still pictures made today as are worth while follow at the end of today's notes.

About 3:00 p. m. Mr. gu yetake and I went over to see a historic Ginko tree at zenpukuji Temple. It is a huge tree that has been made a National Monument. At about 4 feet above the ground it measured 365 inches or about 3½ feet in circumference and is 60 feet or more in height. We secured permission to photograph the tree and while doing that learned that this Temple was turned over to America's first Consul or diplomatic representative to Japan, for his headquarters and home, this was shortly after Commodore Perry's visit (first) to this country.

To the right on entering the Temple inclosure is a comparatively young Ginko tree which we were told stands where the flag pole stood during American representative occupation of this property and from which "Old Glory" first floated in this section of Japan. See picture #43916.

Japanese

There is a ~~Ginko~~ legend about the large Ginko tree to the left of the entrance, to the effect that Shinoran ^{upside down} shonin stuck a cane into the ground and that this tree grew from it. The history of this is told in the Japanese characters shown on the North and West sides of a sign post standing under the tree just outside of the fence surrounding and protecting the tree.

In support of the cane theory, it is plainly to be seen that the general tendency of the limbs, in a measure, is to grow downward. In addition to this peculiarity there is growing from the underside of many of the branches, throughout the tree, especially where the branches curve out horizontally from a slightly downward course, not limbs, but what look to be true roots, they very much resemble stalactites. They vary in size and length from an inch to

Saturday, June 22, 1929 (cont. 2).

6' or more in length. See picture #'s 43919 and 43920. We will try to make another and more striking picture later.

Granting that the legend may be untrue, how can this unique and phenomenal tree development be explained?

The entrance gate and one of the Temple buildings and this ancient Ginko tree are all that remain of the original structure when the temple was occupied by Americas first representative here. The main building and some of the others were destroyed by fire and have been rebuilt. This is an interesting historic and plant find.

We are wondering if scions were secured from one or more of the limbs, showing this downward and aerial root development, would produce a tree like it in America? And whether or not, if such was the case, if such a tree would be of scientific interest and importance?



Negative #43902.

Imperial Iris Garden, Meiji Shrine, Tokyo, Japan. showing a portion of the beautiful display of water lilies.



Negative #43903.

Meiji Shrine Iris Garden, showing a fairly nearby view of a large plant of a beautiful pink flowered water lily.



Negative #43904.

View up stream along the left bank of the small dell and along the right side and across the iris beds. This was a most beautiful view of the wonderful display of Japanese iris, in full bloom.

Negative #43905.

View of a good portion of the Imperial Iris Garden in the Meiji shrine grounds, on the occasion of the special day opening. Tomorrow it will be open to the public. This is only the second year that this garden has been open to the public. This view is from the lower end of the garden. The display continues on past the little summer house in the background. The flowers are of many colors, the garden is said to be considered the best of its kind around Tokyo, and contains 80 varieties of iris.



Negative #43906.

A vista view of portions of the iris beds of numerous colored flowers at the Imperial Iris Garden in the Meiji shrine grounds, Tokyo, Japan.





Negative #43907.

A view across a portion of the blooming iris in the Imperial Garden in the Meiji Shrine grounds, Tokyo, Japan. It is a wonderful display of glorious blooms of dark and light purple, dark and light blue, dark and light lavender, and many combinations of these colors.

Negative #43908.

From a small foot bridge through the iris and across the small stream up the dell past the summer house to the left a beautiful setting and a wonderful display. Imperial Iris Gardens, Meiji Shrine grounds, Tokyo, Japan.





Negative #43909.

View back down a portion of the narrow dell, with the little stream at the center filled with blooming iris plants, a beautiful setting and a glorious display of flowers and colors. Imperial Iris Gardens, Meiji Shrine grounds, Tokyo, Japan.

Negative #43910.

View from the small stream among the iris looking back
down stream. From just back of the low shrubs in the
background, picture # 43905 was made.





Negative #43911.

Taken at the upper cross bridge. This elderly gentleman is watching the photographer, who was trying to secure a close-up of some of the fine iris flowers. Imperial Iris Garden, Meiji Shrine Grounds, Tokyo, Japan.



Negative #43912.

View across the dell showing a dividing ridge between two beds of iris and for proper control of the water supply. It also gives a fairly good idea of the height of the plants and the size of the flowers some of which are more than

8" across.

Negative #43913.

A near by view of a fine large, handsome delicate lavender colored iris blooms. Imperial Iris Garden, Meiji Shrine grounds, Tokyo, Japan.



Negative #43914.

View of the original gate to the Zempukuji Temple, from the inside looking out. This and one temple building is all that remain of the original structure. The Temple building is to the extreme left of the one shown at the left in #43916. See #43915 for close up of carving on one of the gates.





Negative #43915.

Carving on the right-hand gate as you enter at this old temple, where the 1st American Diplomat from the states lived (in this section of Japan.) .



Negative #43916.

This Ginkgo tree, we are told is growing where the flag pole from which "Old Glory" was first unfurled in this section of Japan. For it was at this Temple the first American Diplomatic representative had his office and lived.



Negative #43917.

A large and very old Ginkgo tree at Zempukuji Temple. This temple is said to have been the 1st headquarters for America's first representative in this part of Japan. The tree has a legend #43921-22. "Local tradition says that when Shinran Shonin, the founder of the Honto sect, 1232 A. D. was about to depart for Kyoto, and bade adieu to Ryaki, the apostle of the sect in Eastern Japan, he stuck his staff upside down in the ground saying "Like this staff shall be the strength of the faith and the salvation of the people." whereupon the staff immediately began to grow." This is a phenomenal tree, see following pictures.



Negative #43918.
4391B.

Nearby view of the trunk of this famous Ginkgo tree. It measures 336 inches or about 12' in circumference 4' above the ground. The tree is peculiar in that many of the limbs turn down in growing from the trunk and then out again, roots grow downward from the under side of the branches. This tree is at the Zonpukuji Temple, Tokyo, Japan.



Negative #43919.

A fairly nearby view of the peculiar growth, from a large limb which very much resembles stalactites. They look very much like aerial roots. See picture # 43920. This is a limb of the large 12' tree.



Negative #43920.

A nearby view of aerial roots of the large Ginkgo tree shown in picture #43917-18-19. There are numerous instances of these aerial roots they vary in length from a few inches or just starting to 6' or so in length. Zenpukuji Temple.



#43921.

View showing the N. side of the wood part and the post of the legend about this remarkable old tree which is said to be growing upside down from a cane stuck in the ground many years ago.

Negative #43921.

#43922.

Legend on the west side of a wood post under the ancient 12' in diameter Ginko tree at Zenpukoji Temple. A tree said to be growing upside down from a cane stuck in the ground many hundreds of years ago.



Negative #43922.

Sunday, June 23, 1929.

went to the office this morning and jacketed the pictures made yesterday, but did not get the legends written. About 11:00 a. m. Ruth and I went over to Meiji Shrine to see not only the Iris and water lily display, but also to see and get pictures of the crowd visiting these gardens. It was cool and dull cloudy but otherwise very nice and we found a big crowd of people at the garden and got some very good pictures. Mr. R. Kent Beattie returned today from China. He saw Mr. Arnold over there also Mr. Peter Liu.

They visited the temple at Fa Hua Ssu and saw the "Tiger Paw" and other chestnut trees.

Mr. Beattie reported that the Priest had had some trouble and was in jail. However, he seems to think that Liu is paving the way for a settlement of the difficulty. Mrs. Beattie stopped off at Nara and will visit several other places, and will likely return about the end of the week. Mr. Arnold has not yet arrived, at least we have not had any word from him.

Such of the pictures made today as are satisfactory follow:



Negative #43823.

Taken at Meiji shrine showing a few of the many visitors going out through one of the large torii over one of the main walks.



Negative #43924.

Imperial Garden at Meiji shrine. A rather nearby view of some of the flowers and the visiting crowd.



Negative #43925.
43925.

Imperial Garden at Meiji Shrine, Tokyo, Japan.

A vista view of iris and a portion of the people through the trees and shrubs.



Negative #43926.

Showing a portion of the Iris beds and the crowd on the first day's opening to the public.



Negative #43927.

Imperial Garden at Meiji Shrine, Tokyo, Japan. A portion of the iris beds and the crowd of visitors on the first day the garden was open to the public. This is only the second time this garden has been open to the public in the history of Japan.



Negative #43928.

View in the upper part of the glen showing something of the flowers and the crowd on the first day's opening to the public.



Negative #43929.

Showing something of the crowd at Meiji Iris Gardens on the first day of the opening to the public.



Negative #43930.

Imperial Garden at Meiji Shrine, Tokyo, Japan.

Practically the same as # 43937.



Negative #43831.

Another vista view of a portion of the Iris and visiting crowd at the Imperial Garden at Meiji shrine, Tokyo, Japan.

#43932.

View across a portion of the iris beds showing a good display and a portion of the visiting crowd.



Negative #43932.



Negative #43933.

Looking along the main south entrance walk just inside Meiji shrine grounds.



Negative #43934.

Showing something of the Iris display and visiting crowds on the opening day to the public.



Negative #43935.

View from the small summer house about half way up the iris beds looking back over the iris and at a portion of the people along the walk. Meiji Iris Garden, Meiji Shrine, Tokyo, Japan.



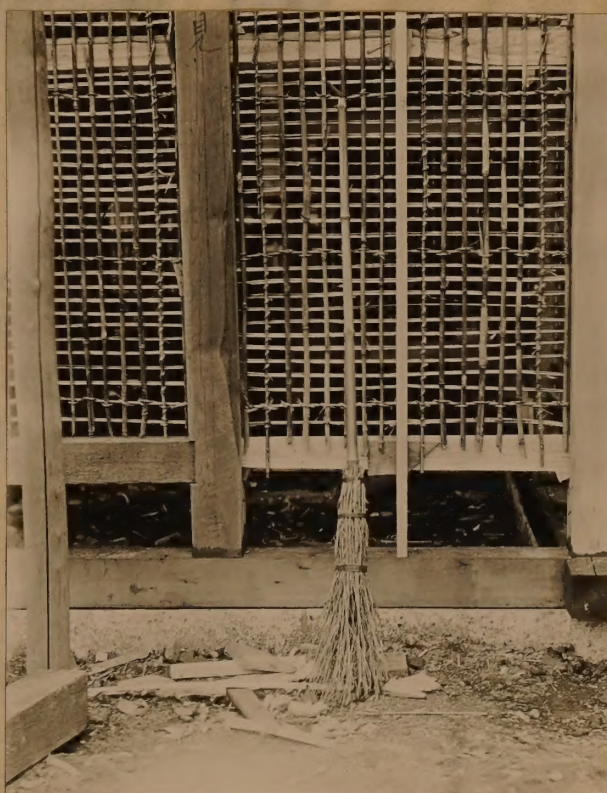
Negative #43936.

Showing a few of the many visitors to the Iris Garden at Meiji Shrine.



Negative #43937.

A part of a visiting crowd on a small foot bridge near the water lily lake.



Negative #43938.

showing a bamboo broom and split bamboo laths. The latter ready for the plaster. Nearly all Japanese houses are made in this manner.

MEIJI SHRINE IRIS NOW AT THEIR BEST

Garden Designed by Emperor
Meiji Open to Public for
Only Few Days

FINEST BLOOMS IN KWANTO

Blossoms Present Riot of Delicate Colors Offset by
Green Forest Glade

The famous private garden in the compound of the Meiji Shrine is open to the public for five days beginning this morning. The iris are now in full bloom, displaying the Oriental beauty that has been associated with the life of the Japanese people from stretch of iris paddies between the wooded glens in the midst of the garden is a scene of long green velvet with intimitable patterns of white and purple.

The display of iris in this garden is unquestionably the best anywhere in the neighborhood of Tokyo. There are more than 80 varieties of iris which were collected from noted gardens in all parts of the country at the wish of the Emperor Meiji, grandfather of the present Emperor. Each variety has its own name of poetic sound and connotation, such as Yomo-no-umi (Seas of Four Climes), Taiheiraku (Great Peace), Koki-no-iro (Color of Seventieth Year), Nishiki-no-shitone (Quilt of Gold Brocade), Hatsushimo (First Frost), Asakagura (Sacred Morning Music), Karyobinga (Bird of Paradise), Gosechi-no-mai (Dance of the Five Season) and Yedo Jiman (Pride of Yedo).

Many Shades Seen

A close scrutiny of the giant flowers reveals many shades of colors beside the snow white, deep purple and lavender. Some of them are white spotted with purple and others are lavender spotted with white. There is a tiny thatched bower on top of a hill in the iris garden from which the most beautiful view of the flowers may be commanded. It was from this bower that the Empress Shoken, consort of the Emperor Meiji, used to enjoy the view during the iris season.

The garden, which winds through a wooded glen is in a beautiful situation. In Minami-ike (Southern Pond), passed on the approach to the garden, are clusters of water lilies, some white, some blood-red, usually in bloom at the same time as the iris.

The garden is situated right opposite the Shamusho (Shrine Office) on the right side between the main entrance to the approach and the shrine building. The garden opens at 8 o'clock in the morning and closes at 4 in the afternoon. The shrine is within easy walking distance of the Harajuku

station on the Yamate line of the government inter-urban electric. It is also reached by Shibuya-bound street cars.

The best time to visit the garden is in the morning before the garden becomes crowded with visitors. The approach to the Meiji Shrine is beautiful early in the morning at this time of the year. A pilgrimage to the Meiji Shrine by this approach will engender a philosophic turn of mind in the visitor. As one approaches the main entrance of the shrine one is struck with the austerity of the precincts. There is a large rectangular stone basin filled with pure water on the left side of the shrine entrance. Here all visitors to the shrine wash their hands for ablution before they go to the shrine to pay their respects to the spirits of the Emperor Meiji. By this visit to the shrine one falls into the right mode to enjoy the true Oriental beauty of the iris and the garden.

Filled With Relics

Before the Meiji era the garden used to be the estate of Lord Ii, prime minister of the Tokugawa Shogun. It was turned over to the Emperor when the Shogun returned his power to the Emperor at the time of the Meiji Restoration. The Emperor was particularly fond of this garden and preserved much of the original shape. Later, however, he remodeled a part of it according to his own ideas.

There are various ancient relics in this garden. One of them is the old well which is supposed to have been dug by Kato Kiyomasa, famous feudal warrior, who lived in the 17th century. It still yields very clear, cold water. The well is provided with two tiny wooden dippers so that visitors may drink water from it. The water in the iris paddies is drawn from this well.

On the bank of the Southern Pond is a wooden pier from where one may enjoy fishing. It is from this place that the Empress Shoken used to fish. It is barred with a chain to prevent visitors stepping on it. Under the shadow of gigantic pines and maples there is a small Japanese house of classic workmanship. The Empress used to rest in this house whenever she visited the garden.

Monday, June 24, 1929.

Raining this morning and this condition continued practically all day.

Worked at the office on our pictures made yesterday and also on our quarterly trip report.

Mr. Ehlers, Assistant Commercial Attache, asked me (Dorsett) to join him at lunch at the American Club at 12:30. We met there for lunch in addition to Mr. Ehlers, Mr.

Julean Arnold, Mr. Sturgeon, Consul, Mr. [redacted] and Mr. [redacted]. Mr. Arnold is on his way to the States. He came in this morning from Yokohama and leaves after dining tonight with Mr. Neville the Consul, for Yokohama, and sails tomorrow aboard the S. S. President Cleveland for the States.

After lunch we prepared for leaving early tomorrow morning for a field trip of about a week in the region about the base of Mt. Fuji, to learn something of the flora, farming, and farm operations of that section of the country.

London, June 14, 1874

My dear Mr. [Name illegible]

I have the pleasure to acknowledge the receipt of your letter of the 10th inst. and in reply to inform you that the same has been forwarded to the proper authorities for their consideration.

I am, Sir, very respectfully,
 Yours truly,
 [Signature illegible]

[Faint text continues, mostly illegible due to fading and bleed-through from the reverse side.]

Tuesday, June 25, 1929.

Left the Shimbashi station, Tokyo this morning at 8:00 a. m., transferred a little later at the Tokyo Station for Shinjuku station and left the latter place at 8:40 for Otsuki, Japan, where we arrived at 11:30 a. m.

The following train window observations and notes were made between the two last named stations.

A mile or more from Shinjuku we saw quite a number of plantings of kochia or broom bush. The plants are about a foot in height but we are advised that they grow to be 2 feet through and 3 feet or more in height, and are used for making bush brooms.

Tachikawa Station 9:25. The important crops in this region are mulberry, barley, wheat, rice and the native vegetation is chestnut, pine and cedar. In a short run from Tachikawa we were out into a fairly good sized valley crossed the Tama river, a rather broad shallow stream. In this valley we saw grain threshing and considerable activity in the preparation of rice land and also in the planting of rice. We came into a rolling country where we saw chestnut, wild wisteria, oak and many other native trees, and shrubs which we did not recognize.

Sayoda Station. Here there is a number of flowering cherry at the station. To the right in the way the train is going is considerable native wild growth, red pine, chestnut and other trees.

Hochioji station 9:45. Here boys were hollering what they had to sell, we only recognized two: "Ice creme" and "Bento".

Out from Hochioji a short distance we ran into a rather narrow valley where there was comparatively little of any artificial irrigation. Here we saw broad beans, barley, wheat, mulberry, replanted rice, tea, soybeans about 6" in height, sweet potatoes, lilies in considerable quantity.

Osakawa station 10:05 a. m. It was at this station we got off a few days ago to visit the 700 year old cherry tree of Mr. Kimura's. Shortly after leaving this station we came into foot hills or low mountains, and mixed and in close proximity we saw cryptomeria, chestnut, bam boo and other native trees and plants we did not recognize. At each farmers home we usually saw one or several persimmon trees. In this region and practically until we reaches Otsuki we were frequently running through tunnels, and some of these were quite long.

Yosi Station 11:25. Just before getting here we saw along the railway right of way, a shrub which resembled the Oregon burberis only the seed was not arranged in the same way and appeared large. It was a striking plant.

The landscape and scenery through here is very good indeed. To the left at Uyenbara Station and far below runs the Katura river, and from the fisherman playing the rod we judge the fishing is good.

The mountain sides on both sides of the river are pretty well cultivated to wheat, barley and mulberry.

Saruhasha station 11:15. Near here is one of the three famous bridges of Japan.

Otsuki Station 11:30. We left the train here and made

Tuesday, June 25, 1929 (cont. 2).

for one Inn, first to get lunch and second to locate an old cherry and wisteria, but found that these are further on toward Fuji. So after getting a dinner of rice and fresh trout we went out into the country and secured about a dozen still pictures and several shots of motion pictures. We also secured seed of several things and also herbarium specimen.

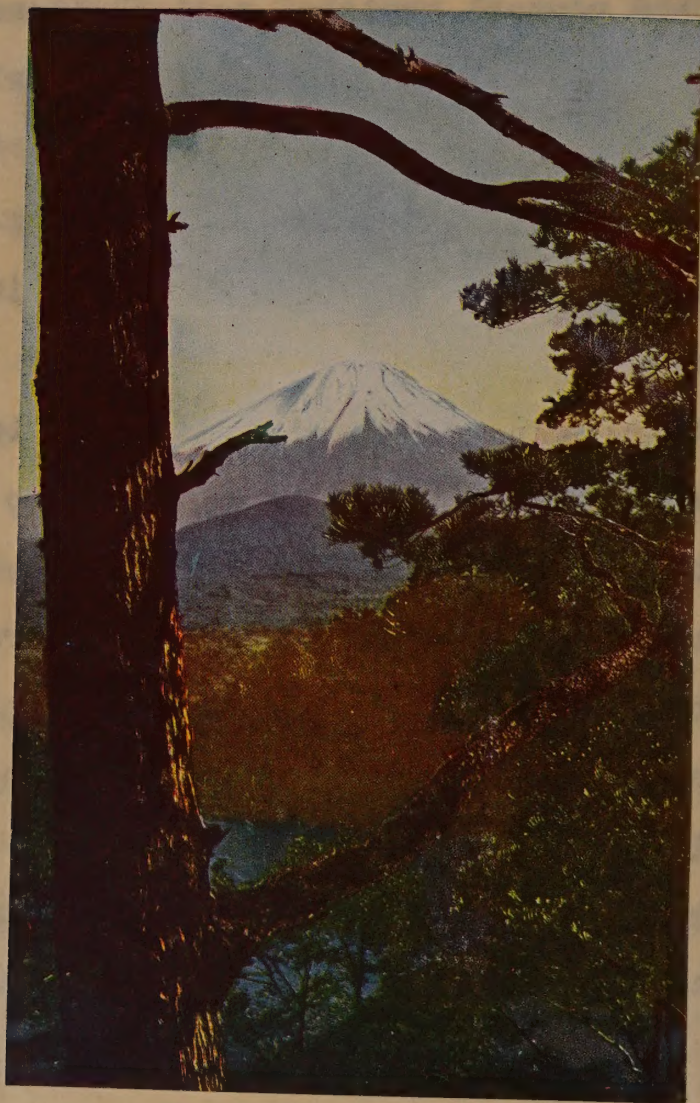
We left Otsuki, Japan on a train at 4:40 and arrived at Fuji Yoshida at 6:00 p. m. We left the train here and went at once to the Hotel Asakubo, we will remain here tomorrow and perhaps again tomorrow night.

After we had finished dinner Mr. Reisen Akiyama, Agricultural Engineer and expert called to see us, and spent some little time giving us information about this section. He cannot be with us tomorrow but will arrange for some one to assist us.

There are a good many persimmons here he says, the variety is Shinkurazaki kaki. We will try and see something of this industry tomorrow. There is a branch horticultural station here. It is a branch of the Yamaguchi-ken Agricultural station.

Mt. Fuji's snow capped head towers above a bank of clouds and from our room looks grand.

A few post cards submitted which give fairly good views of her from different positions will serve to give some little impression of her grandeur and beauty.



Mt. Fuji in a vista view from Lake of Rooshiyo. One might well imagine he is in northern California looking at Mt. Shasta or at Bellingham, Washington, looking at Mt. Baker.



Mt. Fuji from Lake of Motosu.



A view of Fuji san from Lake of Ashi, which is quite effective and beautiful.

CARTE POSTALE

Union Postale Universelle



A view of a portion of Lake of Sanchu and Mt. Fuji in the background.



Negative #43939.

Farmers threshing barley by whipping it over a screen. Near Otsuki, Japan. See #43940.



Negative #43940.

Threshing barley by hitting small bundles of it over a slatted frame.



Negative #43941.

Inspecting soybeans which are soon to be plowed or dug under for green manure, besides these there is a layer of grain straw, wheat or barley on the ground to be put under with the beans. Near Otsuki, Japan.



Negative #43942.

This is the life! But, would Americans work in this way?

See pictures #'s 43943-4 and 43945.



Negative #43943.

Harrowing land and getting it ready for planting to rice. See #'s 43943-4 and 45.



Negative #43944.

A third view of two farmers and the same outfit preparing land for planting to rice. The horse is guided by means of a bamboo pole. See pictures 43942-43 and 45.



Negative #43945.

A fourth view of the same farmers and outfit preparing land for planting to rice. See pictures 43944-43 and 42.



Negative #43946.

In front of a silk worm cocoon market on the principal street of the village of Otsuki, Japan. See 43947 and 8.



Negative #43948.

Looking along a portion of the principal street of the village from just beyond the silk work cocoon market, see #'s 43946-7. Otsuki-cho, Japan.



Negative #43947.

The bamboo baskets at the right in the foreground are in front of a silk worm cocoon market. This is one of the main streets of the village of Otsuki-cho, Japan.

See #'s 43948-6.

Wednesday, June 26, 1929.

When we got out about 7:00 this morning, Mt. Fuji was standing out in bold relief and looked wonderful.

Mr. Tokuzo Sasiki came about 8:00 with a car and we went up over the new road which is being opened to within about a quarter of a mile of the first rest house.

The drive out is great. Just after leaving the city the road runs through a small area of fine Japanese cedars, then into quite a planting of red pine. Just as we were getting out of the old pine into a comparatively recent planting, Mt. Fuji loomed up beautifully in the distance. We called a halt and tried several pictures and sincerely hope some one or all are good. We also made one back over the road we had just passed to show it and the red pines.

After getting to the end of the road we walked up to the first rest house.

The valley was overcast with clouds and mist, and we were not able to make any pictures from there. However, we collected wild strawberry seed, mountain cherries with small leaves and seed, edible honey suckle, and quite a lot of herbarium specimen. On our way back we stopped here and there for collecting and got a fine salmon pink azalea. They are practically over, but they surely must have been fine. We also got specimen of a purple iris.

On the way back to town we stoped at Genken Shrine, which is among the cryptomeria. Here we found a cryptomeria in circumference which measured 131 feet, Japanese measurement, 8' above the ground where the rope is tied, and 75 feet in circumference at the ground, and about 130 feet in height. These are all

Japanese measurements. We tried making several pictures.

After lunch we went out in the neighborhood of Fuji Yoshida and tried to get pictures of a very large single stem wisteria which is almost to the top of a large tree and within about 20 feet within the top of a taller tree nearby. The trunk of the single stem wisteria at 2 feet above the ground measured 81 inches in circumference, our measurement. It was difficult to get any pictures here, however, we tried and will know when we get back to Tokyo how these turned out.

We had a glorious day and by 10:00 p. m. had our seed and herbarium specimen all written up and in shape.

Such of the pictures made today as are good follow.



Negative #43949.

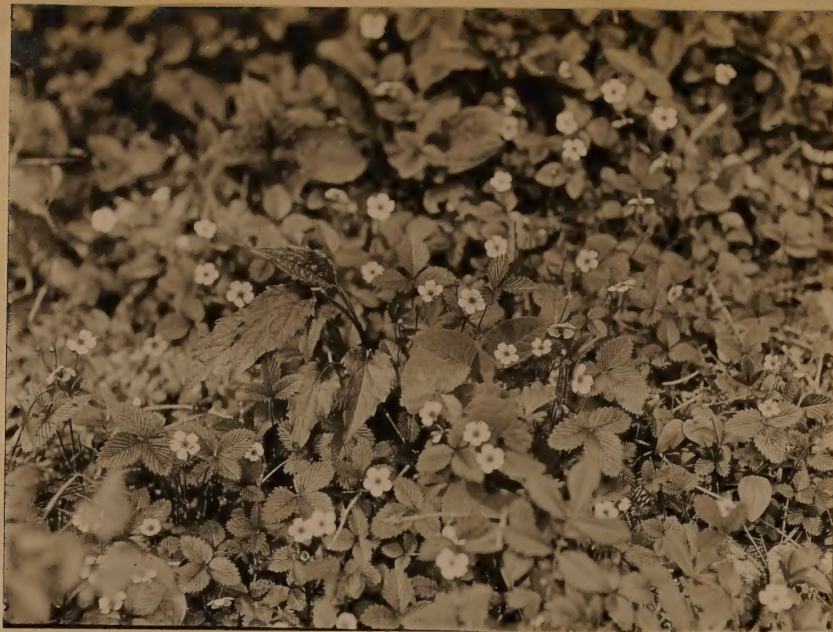
View from our room in the Asakaba Hotel at Fuji Yoshida, Japan.

#43950.

A native woman near the first rest station on the trail up Fuji san, from the north, holding a handful of wild orchids, large pink flowers.



Negative #43950.



Negative #43951.

View of wild strawberries in flower at the first rest station on the north trail up Mt. Fuji.



Negative #43952.

View showing piles of leaves and small branches of woody plants on a rice paddy ready to be scattered and turned under. The man in the picture is Mr. Morse.



Negative #43953.

View showing a Japanese farmer carrying two bundles of twigs and leaves of woody plants on to a rice paddy. When a sufficient number of these have been placed on a paddy the material is scattered and then turned under.



Negative #43954.

showing bundles of twigs and leaves of woody plants at the edge of a rice paddy, ready for use as green manure.



Negative #43955.

A Japanese farmer scattering green manure on a rice paddy preparatory to turning it under and planting rice. Mr. W. J. Morse is preparing to make a motion picture of this operation.



Negative #43959.

View of Mt. Fuji along the trail through red pines on
the North ascent to the mountain . see #43960.



Negative #43960.

Another view of Mt. Fuji along the trail through red pines on the North ascent to the mountain, a little nearer Fuji than #43959.

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July 19174

Negative #43962.

The party, with the exception of the photographer, and automobile at the end of the auto road on the North trail leading to the top of Mt. Fuji. Mr. H. Guyetake and Mr. H. J. Morse are in the center, we do not know the other men's names.



Negative #43961.

View back down the trail from the same position from where pictures #43959 and 60 were taken of Mt. Fuji through young red pines. This view also shows beautiful old red pines.



Negative #43963.

At the foot of Mt. Fuji showing a distant view of a Japanese cedar reported to be 1200 years old. This tree is 31' in circumference 8' above the ground, where the rope is shown on pictures #43964-5. The height of the tree is given as 130 feet and the circumference of the tree at the ground is 75 feet.



Negative #43964.

showing a somewhat different view than #43965 and 63.

Taken at Senken Shrine, near Fuji Yoshida, Japan.

Negative #43965.

A nearby view of a portion of the trunk of the 1200 year old Japanese cedar shown in pictures #43963 and 4. The circumference of the tree 8 feet above the ground is 31 feet, at the surface of the ground 75 feet. It's height is 130 feet. The above measurements are Japanese, they are about the same as ours.





Negative #43966.

From a position under the entrance gate to Senken shrine
looking through the large torii along the avenue of
Japanese cedar and stone lanterns.



Negative #43967.

This view, fairly close-up, shows a portion of the base of a very large single-stem wisteria. This stem is 20 feet or more to the branches and the vine covers a good portion of two or three large trees. The trunk of this vine at 24" above the ground is 81 inches. See pictures #43968-9.



Negative #43968.

A distant view of the National Monument wisteria shown in pictures #43967-9. The man near the center of the field is standing just to the left of the trunk of the wisteria.



Negative #43969.

A view from a position on the hillside to the west of the large wisteria shown in pictures #43967-8. In this view the wisteria is shown at the top of one tree and within 15 or 20 feet of the top of a taller tree to the right.

Negative #43970.

This view shows iris and other plants growing in abundance along the ridge of a native house, Fuji Yoshida, Japan. see #43971.



Negative #43971.

This view shows iris and other plants growing in abundance along the ridge of a Japanese house. See #43970.



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Thursday, June 27, 1929.

Left Hotel Asakaba about 8:00 this morning en route to Shojiko where we arrived about 11:00 a. m.

We had a wonderful tryp by auto. Stopped at interesting places along the way and collected herbarium specimen and made quite a number of pictures.

We stopped to see what is called lave moflds, round holes in the lava where it is supposed to have run about the trees and killed them. Where these trees rotted away it left a hole the size and shape of the tree.

We also stopped the cave in the lava which is utilized for the storage of silk worm eggs. We went down some little distance and then back through an irregular and varying sized cave in the lava 388 feet.

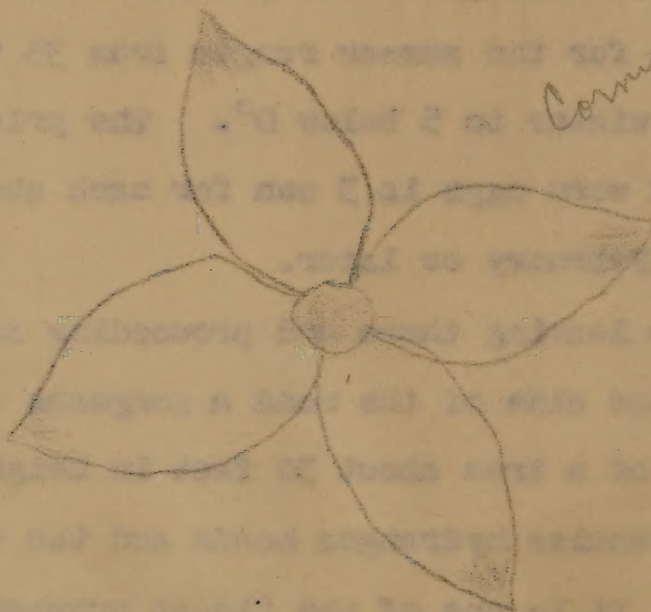
The cave belongs to the prefectorate but is leased. The temperature for the summer ranges from 35 to 37° F., and during the winter to 5 below 0°. The price for the storage of the silk worm eggs is 3 sen for each sheet of 32 eggs from October to February or later.

After leaving there and proceeding about a mile or so we saw at the side of the road a gorgeous white flowered vine to the top of a tree about 30 feet in height. The flower in general resembles hydrangea heads and the flowers are about that size. It is one of the finest ornamental vines we have seen and is well worth introducing. We secured herbarium specimen and we hope a picture.

A little further on on a lava bed we saw a beautiful ash with wine colored seed, also what we took to be a

Vaccinium species, a tree 20 feet or more in height.

At several places we saw on the mountain side, a blanket of white among the green. The last of these we saw was just before reaching Shojiko. We stopped here for lunch and after lunch we went to see what plant produced such a showy and beautiful flower. We found it to be a dog wood tree 8 or 10" in diameter and 30 or more feet in height. It is a beautiful thing fully as fine as our white one, we think. We collected specimen and tried still and motion pictures of it. Below is a tracing of a flower secured later and which is not quite so large but to make up for this has delicately colored pink tips to the bracts.



Thursday, June 27, 1929 (cont. 2.)

This proved a pretty good day for collecting. From the main road along the trail to the hotel we secured quite a number of herbarium specimen of a good many interesting plants, and seed of a fine orange-yellow raspberry of very good flavor and quality.

THESE ARE THE RESULTS OF THE INVESTIGATION

CONDUCTED BY THE COMMISSIONER OF THE GENERAL LAND OFFICE

IN THE MATTER OF THE APPLICATION OF THE

COMMISSIONER OF THE GENERAL LAND OFFICE

TO THE COMMISSIONER OF THE GENERAL LAND OFFICE

FOR THE PURPOSE OF OBTAINING A

DEED OF CONFESSION OF THE

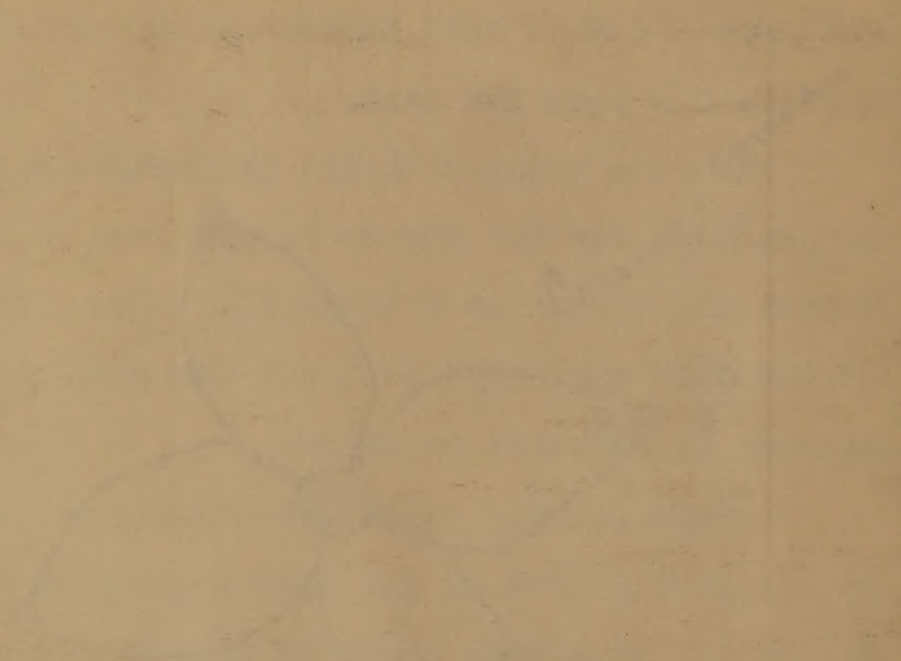
COMMISSIONER OF THE GENERAL LAND OFFICE

IN THE MATTER OF THE APPLICATION OF THE

COMMISSIONER OF THE GENERAL LAND OFFICE

TO THE COMMISSIONER OF THE GENERAL LAND OFFICE

FOR THE PURPOSE OF OBTAINING A





Negative #43956.

A rather close up view of a very fine specimen of bridal wreath in full bloom. It appears to us that the flowers are more numerous and larger than those we have in the States. The plants in the wild are very handsome.

#43957.

View of a good sized tree of what we take to be a species of *vaccinium*, growing on a lava bed a few miles to the East of Lake Shojiko. Mr. Morse is standing under the tree and pointing up to the portion over his head.



Negative #43957.



Negative #43958.

#43958.

A close up view of seed clusters of a small ash, the seeds are small and a bright wine red color, very showy and attractive. This we believe to have remarkable ornamental possibilities. We hope to secure mature seed later.



Negative #43972.

View over a portion of lava beds between Fuji Yoshida and Lake Shoji. It does not do justice to what we saw.



Negative #43973.

A fairly nearby view of a branch containing numerous flowers of Japanese dogwood which are 2" or more in diameter.

Near Lake Shoji, Japan. See #43974-92-6-7.



Negative #43974.

Near Lake Shoji, Japan. A nearby picture of a portion of a flowering branch of this handsome dogwood. See pictures

#43972, 43992-6-7.



Negative #43975.

View, fairly nearby, of a white rose which is quite abundant and widely distributed throughout this region. This was near Lake Shoji, Japan.

Rosa multiflora



#43976.

Along the road from the rest house at Shoji Lake to the Shoji Hotel. A very attractive shrub.

Coriaria japonica

Negative #43976.



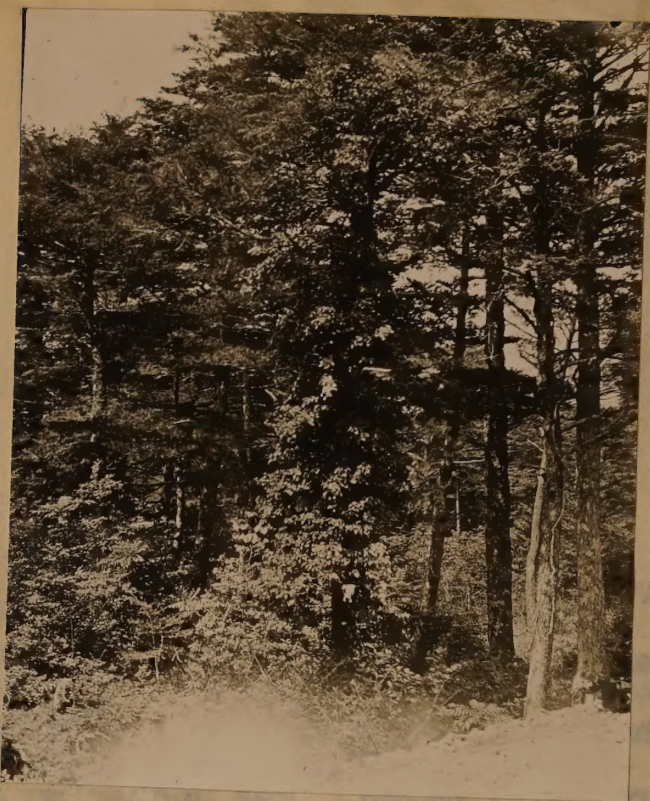
Negative #43977.

Taken along the road from the rest house at the East of Lake Shoji to the Hotel Shoji. The flowers were of a beautiful pink color. See herbarium specimen #.



Negative #43978.

A fairly nearby view of clusters of flowers of this peculiar vine seen on the left hand side of the road on a lava bed between Fuji san and Shoji, flowers resemble somewhat the hydrangea.



Negative #43978 a.

A rather distant view of a white flowered vine
40 to 45 feet high on the side of the road between
Fuji san and the Shoji Hotel. This was a wonderfully
spectacular vine. Cuttings sent in under #

1927



Negative # 43979.

One of a chain of Kolf a dozen lakes in the vicinity
of the N.E., North and N.W. section of the base of
Mt. Fuji. Lake Kawaguta.



Negative # 43970.

Shop Lake
 one of the smaller of a chain of half a dozen lakes in the vicinity
 of the N. E., North + N. W. of Mt. Fuji. The white blotch on a
 point almost directly across the lake is the Shop Hotel
 where we spent the night.

Friday, June 28, 1929.

Left Shoji about 8:00 this morning and arrived at Kofu about 7:30 p. m. and put up at the Konaya Hotel.

This morning just as we were leaving, the pack horse decided quite suddenly that he did not care to make the trip carrying the load, so he started to run with the Japanese ~~boy~~ boy hanging on to him and making frantic efforts to stop him. Finally he succeeded in getting him stopped but not until the load had shifted from his back to his side. He was then dangerously near a precipice several hundred feet down, and if they and the baggage had gone over they likely would have landed in Shoji Lake before they stopped.

Our 5 x 7 camera and herbarium specimen as well as all we had collected the seed/and our suit cases were all in the pack. We considered ourselves fortunate in not experiencing a serious accident.

The land-lady of the hotel who with others from the hotel, saw the affair, ordered the boy home with the horse and had the baggage sent across the lake by motor launch and another boy and horse was secured at the village of Shoji, who completed the trip with us.

At Su wa Shrine in the village of Shoji we saw a very fine cryptomeria japonica tree. It is a national monument, and said to be over 1000 years old, and 140 feet (Japanese measurement) in height. We measured it's circumference and found it to be $35\frac{1}{2}$ feet around at about 2' above the ground.

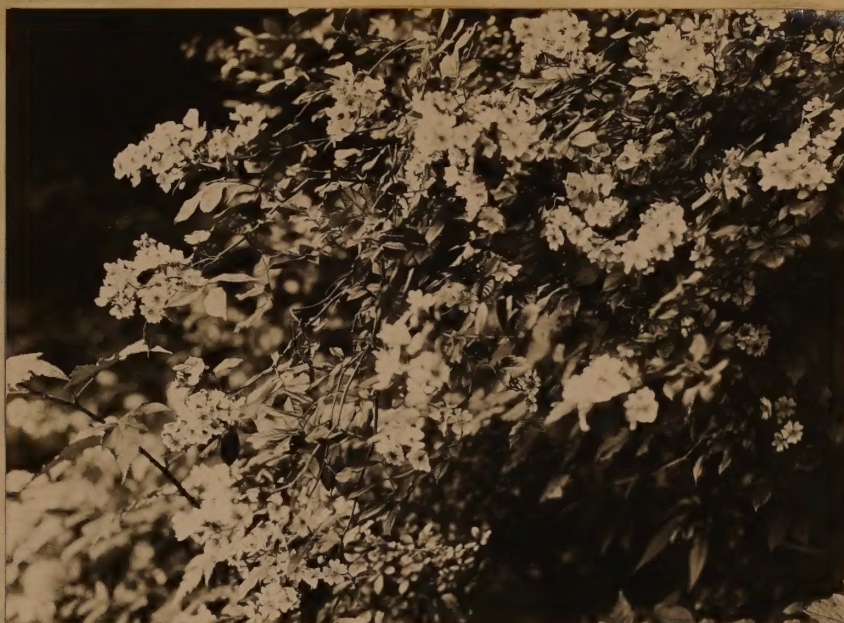
We tried to photograph the entire tree and also made a nearby view of the base of the tree. We also tried a

panoramic picture of the height of the tree, and as can well be imagined, we are anxious to see what we got in this.

We had fine weather and a most wonderful day, and crossed over two mountain ridges, each one of which was about 4000 feet in height. We saw many interesting plants of both trees and shrubs, and also herbaceous plants. We collected some seed and more than 50 numbers of herbarium specimen.

This is a region we must try and get back to this fall to get seed of as much as possible of the interesting plant material seen today.

Such of the pictures made today which prove to be worth while follow.



Negative #43981.

Along the west shore of Lake Shoji not far from the Shoji Hotel we found this lovely rose.



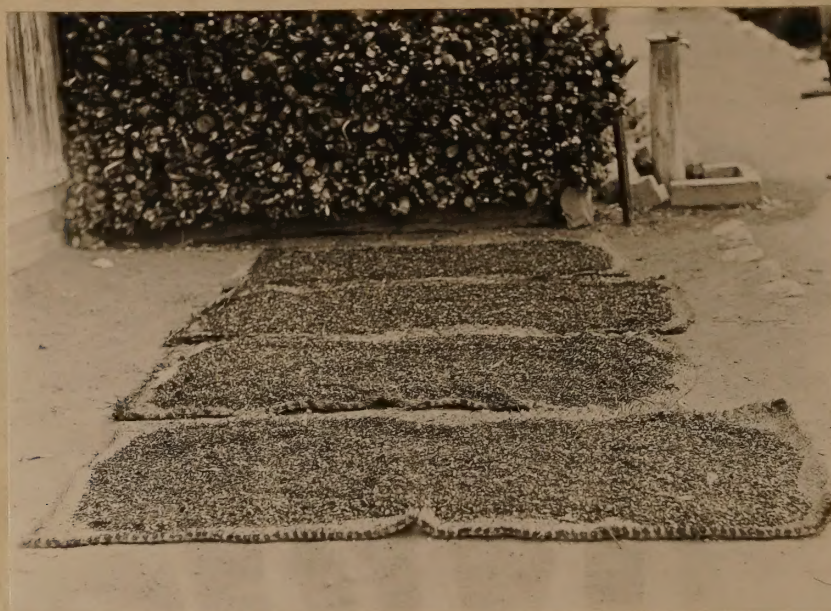
Negative #43982.

N. W. shore of Lake Shoji looking across the lake to Mt. Fuji in the distance. Hotel Shoji is on the point of forested land extending into the lake on the right.



Negative #43983.

Village of Shoji. A nearby view of a pile of silk worm droppings on a rice straw mat before spreading to dry. See picture #43984.



Negative #43984.

Village of Shoji. View of silk worm droppings drying on rice straw mats for use as manure. See Picture #43983.

Negative #43985.

View of the front of the house of a Japanese resident of the village of Shoji, Japan. This shows a row of bundles of mulberry branches on the roof drying for fuel for winter use and on rice straw mats on the ground in the front yard, silk worm droppings drying for use on the rice paddies. See #'s #3984-3.





Negative #43986.

This view was taken to show *Selaginella* on the ridge and cedar bark weighted down with lava rock, also a pile of mulberry branches from which the leaves have been eaten by silk worms.

Negative #43987.

View of a portion of a native's garden and home, with
Selaginella sp. growing along the ridge of the house
which has a grass thatched roof. Shoji-mu ra, Japan.





Negative #43988.

A National Monument at Shoji, Japan. The circumference of the trunk of this tree xx about 4 feet above the ground is $35\frac{1}{2}$ feet, height about 142 feet, age given as more than 1000 years old. See #'s 43989-90.



Negati ve #43989.

suwa Shrine, Shoji Mura near Shoji Lake. For details
see #'s 43990 and 43988. Mr. W. J. Morse standing
at the base of the tree.



Negative #43990.

Suwa Shrine, Shoji Mura, near Lake Shoji. A fairly nearby view of a portion of the base of this National Monument *Cryptomeria japonica* tree. For details see picture #4398 8. P. H. Dorsett stands near the trunk at the left.



Negative #43991.

En route from Shoji to Kofu, and this was not all of our baggage, we carried 3 cameras and a plant press.



*Cornus
Kousa*

Negative #43992.

Near Lake Shoji. A fairly close up picture of a portion of a branch of flowering native dogwood. See pictures #43973-4, #43996 and 7.



Negative #43993.

Looking back through tree branches to the village and lake Shoji. In reality this was a wonderful vista view.



Negative #43994.

The mountain side after leaving Shoji. A view back from the mountain side showing a portion of the village and Lake Shoji.



Negative #43995.

En route from Shoji over the mountain to Kofu.
The fruit of this raspberry is large and golden yellow,
of good size and very good quality, fruit is born under
the branches and leaves. seed and herbarium specimen
sent in.



Negative #43996.

Between the village of Shoji and Kofu going down over the
first range of mountains. Looking from the trail to a fine
display of dogwood on the mountain side. see pictures #43992,
43974.



Negative #43997.

Near the valley over the first mountain ridge between Lake Ghoji and Kofu. A fairly close up view of flowering branches of dogwood. see #'s 43973, 43974, 43992-6.



Negative #43998.

Baskets of this type are extensively used in connection with the shipment of silk worm cocoons.



Negative #43999.

View somewhat similar to #43998 only in this picture the basket-maker has stopped work to look at the photographer.

1744

view.



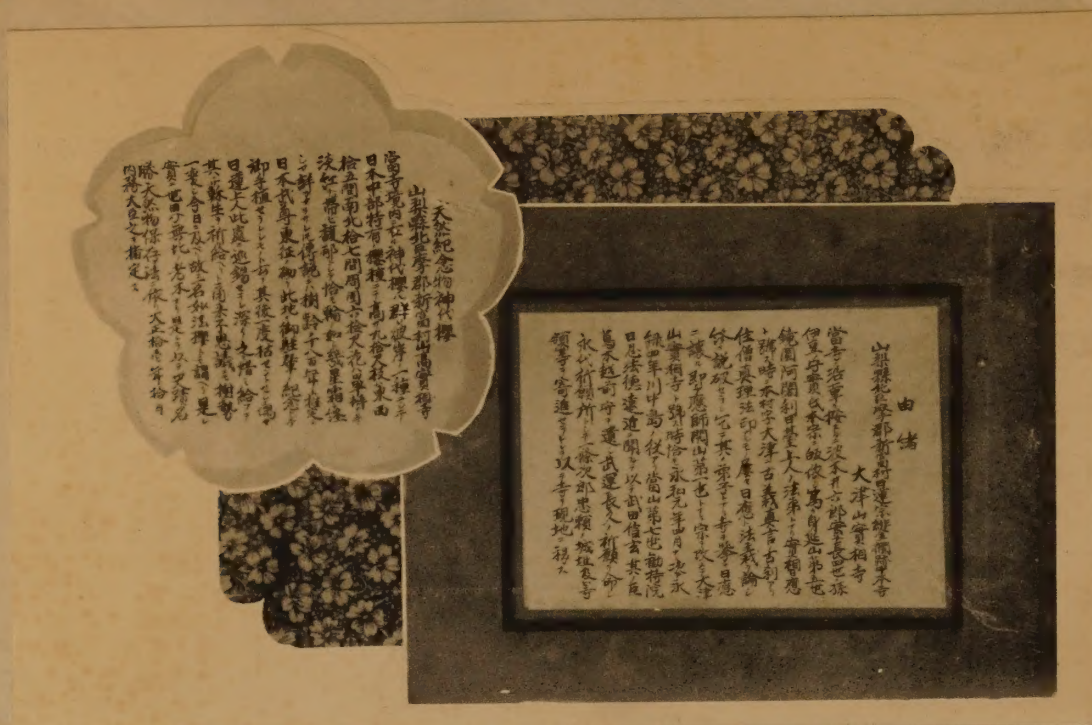
Negative # 45999 of
a panoramic view from the base of
apparently we did not go far enough.
Maybe we can do better next time!

Saturday, June 29, 1929.

Left this morning on the train at 10:25 for Hinohara, Japan, where we arrived at 11:35. We left immediately en route for Jissuji Temple, where grows the famous early flowering cherry, Usubenishiroza Kura. (Higan). We collected seed and herbarium specimen en route. Stopped for lunch at the village of Kurasawa and arrived at the Temple at the village of Yamadaka about 1:00 p. m.

This is a remarkable cherry tree! It is reported to be more than 1800 years old, measures 34-7" in circumference about three feet above the ground, and it's longest spread of branches is about 75 feet. It has three large branches and a 4th is cut away. A good trunk continues above the 3 large limbs. We made several still pictures but on account of strong wind may not get anything really creditable. We also tried a distant motion picture of the tree and a close up of the tree with Mr. Morse and Mr. ~~guyetake~~ measuring the girth of the trunk. We collected enough fruit from the ground about the tree for several ounces of clean seed. At least Historically, these should be of interest at home.

The following exhibits of three post cards, one the history of the tree in Japanese, the other two, one a rather distant view of the old tree in bloom, the other a fairly nearby view, serve, with such of the pictures that we made today as are worth while, to give the reader something of ~~an~~ an idea of what an 1800 year old tree really looks like. It is said to be the oldest cherry tree in Japan.



The National Monument of Cherry

(jindai zakura).

At Jissoji Temple (in the grounds) Yamadaka, Shintoni-mura (village), Kitakuma-jun (county), Yamanashi-ken (prefecture).

This cherry tree is called (jindai zakura) *prunus sequinoctialis*, Miyoshi faggrogata, Miyoshis, it is located in the middle part of Japan. The height of this tree is about 100 feet, the branches from East to West measure about 100 feet and North to South about 114 feet, Japanese measurement. The trunk is about 70 feet around. The age of the (no record has been kept) must be more than 18 00 years. The flowers are single, light pink.

According to tradition this is a memorial tree planted by Nippon takakerunomikoto (brother of the Emperor Jimmu) while his expeditionary force was on its way to the Eastern part of Japan. Since then this tree has had trouble and nearly died. Nichirenjo Nin (the founder of Nichiren shu)

(Buddha)

History of Cherry Tree (cont)

visited here and prayed that this tree be renewed to health and keep in good health forever. After that this tree had no trouble and grew nicely until recently. In October, taisho 11th, 1922 it was made a Historical and National Monument by the Minister of Interior.



A distant view of this beautiful and marvelous old tree in full flower.



A nearby view of this cherry tree showing the trunk and main branches when the tree was in flower.

Negative #44000.

Jissoji Temple, Yamadaka Shintame-mura, Kita Koma-gun Yamanashi-ken. This is an 1800 year old flowering cherry tree, early blooming with white flowers. View from a position in the field to the west. See #'s 44001-2.



44001.
Negative #44001.

1800 year old flowering cherry tree, early bloomer,
with white flowers, single. Taken from a position in
the field to the East of the tree. See #'s 44000-2.



Negative #44002.

This is a National Monument and is published as *P. acuminata* Miyashii f. *agregata* Migashia.

The tree now contains three large side branches one (a 4th) has been cut away, above these there is a large central trunk. The trunk 4 feet above the ground measures 34 feet 7 inches in circumference and is estimated to be more than 1800 years old. See pictures #44000-01.





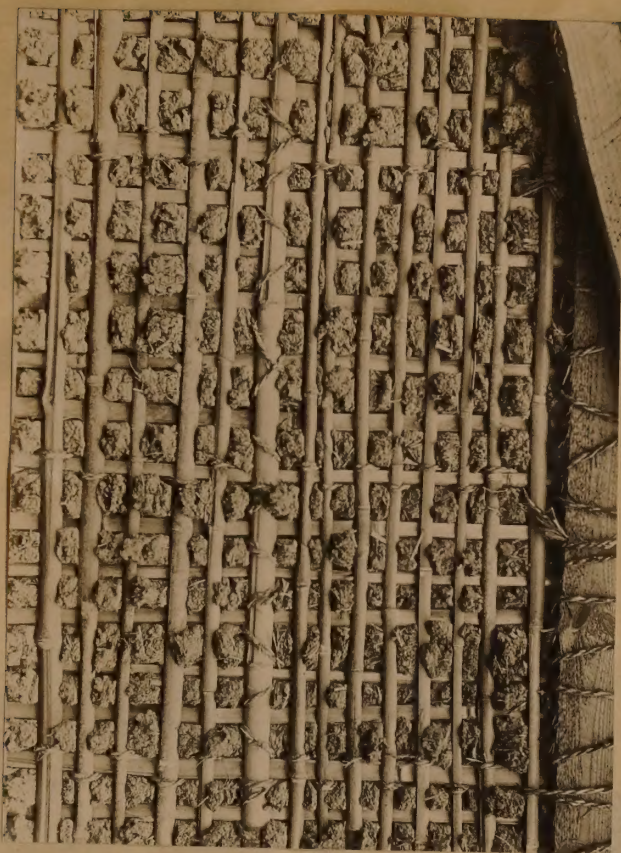
Negative #44003.

In the vicinity of Otsuki, Japan. A nearby of a rice paddy showing wheat or barley straw and soybeans after the first plowing. This is yet to be worked down.



Negative #44004.

Vista view from the mountain side after leaving Kurosewa over a Branch of Fuji River and the village of Kurosewa and on out over the valley.



#44005.

A nearby view of a
portion of a side wall of
a native Japanese house.
The laths are split bamboo,
the plastering is mud
mixed with straw.

Negative #44005.
#44005.



Negative #44006.

A pile of bamboo baskets before a silk worm cocoon merchants
place. The cocoons are shipped in baskets like these.



Negative #44007.

Portion of a small valley from a hillside in the above district. Yanadaka Shintome Mura, Japan.



Negative # 44007a.

View of a farming area in the vicinity of the Jisai Temple. Taken from a position to the N.W. of the old 1700 year old cherry tree, looking about North.

Sunday, June 30, 1929.

Left about 8:00 this morning for unknown farming areas up the valley, to see and collect what we could, but especially to try and secure a number of motion picture shots showing wheat and barley threshing, and cleaning practices and any other scenes which appear to us to be of interest.

We collected about half a dozen herbarium specimen and seed of what may be a new raspberry. It was growing along an irrigation ditch.

Near the village of Shiosaki, near Minasaki Station, we found out along a fill or bank ripe fruit of the red berried shrub we saw on the way to Otsuki and which we saw in abundance yesterday while en route from Kofu to Henohara. This we think is well worthy of introduction on account of the profusion of bright red berries. We have not seen the flowers but understand that they are yellow. From some Japanese farmers, nearby, we learned that the people in the vicinity claimed the berries were poisonous, and would not touch them as there were plenty of beautiful flowers about. Dorsett decided to taste them, but suffered no serious results. (This last sentence was copied from Mr. Morse's diary).

This we think will make a wonderful ornamental, and trust that the seed collected today will arrive safely and that a nice lot of plants will be obtained from them for distribution and trial.

Left Kofu at 3:45 this evening for Tokyo.

The following train notes en route may prove of interest

and value to whoever may look over this field trip report.

3:45 p. m. leaving Kofu. Between there and Sakaori we saw numerous plantings of grapes on overhead flat trellises. We wonder why this method of training is practiced in place of the upright 2 or 3 wire system, which would admit of something being grown between the grapes.

At Katsinnuma there are some excellent iris plantings on the ridges of houses. This is also one of the very extensive grape growing regions. In several places along the line we noticed quite extensive reforestation work has been done.

We enjoyed the run in even though for a good part of the trip the train was crowded, quite probably week-end returners for many of them had fishing rods, and fish baskets, and in some, apparently, there were fish. How many or how big we do not know.

We arrived at Shinjuku Station where we had to change to the elevated car at 8:25 p. m. and at Iurakucho Station about 9:00 p. m.

Such of the pictures made today as are worth while follow.



Negative #44008.

In the vicinity of Shojiko. Turning under soybeans which are 10 to 12" in height in preparation for planting rice, the men and horse approaching the camera.



Negative #44009.

In the vicinity of Shojiko, Japan. Practically the same as #44008 only the men and horse are going from the camera.



Negative #44010.

In the vicinity of Kofu, Japan. Cutting out the ripe
soybeans
barley and leaving the ~~barley~~ to be plowed under.



Negative #44011.

In the vicinity of Kofu, Japan. A nearby view of a
Japanese woman harvesting barley and leaving the
soybeans to be turned under in the preparation of the
land for planting rice.



Negative #44012.

In the vicinity of Kofu, Japan. Two Japanese women cutting barley and leaving soybeans for turning under in the preparation of the land for the planting of rice.



Negative #44013.

In the vicinity of Kofu, Japan. Two Japanese women planting soybeans on rice paddy ridges. See #44014.



Negative #44014.

In the vicinity of Kofu, Japan. A somewhat different view of the two Japanese girls planting soybeans. See picture #44013.



Negative #44015.

In the vicinity of Kofu, Japan. A farmer turning under wheat or barley straw and soybeans preparatory to the preparation of the land for planting rice.



Negative #44016.

In the vicinity of Kofu, Japan. A Japanese farmer hoeing in soybeans and wheat or barley straw preparatory to planting to rice in the near future.



Negative #44017.

In the vicinity of Kofu, Japan. A Japanese farmer and helper, perhaps his wife, threshing grain with a foot power machine. See #44018.



Negative #44018.

In the vicinity of Kofu, Japan. Slightly different scene from #44017.



Negative #44019.

In the vicinity of Kofu, Japan. Japanese planting rice.



Negative #44020.

In the vicinity of Kofu, Japan. A bamboo pole is commonly used as a ~~clothes~~ clothes line or pole.



Negative #44021.

In the vicinity of Kofu, Japan. A Japanese farmer winnowing barley.



#44022.

In the vicinity of Kofu,
Japan. A Japanese
woman threshing barley
with a large wood mallet.
See pictures #44023-24.

Negative #44022.

#44023.

In the vicinity of Kofu,
Japan. A slightly different
scene from #44024 and 22.



Negative #44023.



Negative #44024.

In the vicinity of Kofu, Japan. Still another scene like #44022-23.



Negative #44025.
#44025.

In the vicinity of Kofu, Japan. A nearby view of a vine bearing good size bunches of rather small green fruit, in this case its growing on a rocky fill.



Negative #44026.

In the vicinity of Kofu, Japan. A nearby view of a beautiful red berried shrub from which we secured seed and sent it to Washington.

